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ABSTRACT

Disparate data on nonprofit arts organizations in the 1970's were analyzed in order to construct a comprehensive picture of the growth of the arts during this decade. Studied were the rate of growth and change in the number of institutions and in their levels of output, employment, income, and expenses. Conclusions are presented regarding the overall arts picture, each of the five major artistic disciplines (symphony orchestras, opera, theater, dance, and museums), and data collection in the arts. Compared to preceding years, the decade of the 1970's showed the same range of growth for all the disciplines, except the young modern dance companies. All performing art forms, except opera, grew at a slower pace in the 1970's, especially symphony orchestras. The need for financial management was recognized. Art organizations need to be systematically classified by some widely accepted taxonomy. Appendices conclude the report. The first appendix is a listing of criteria used by art organizations for membership or inclusion in a survey. The other appendices are discussions on: the imputation and correction of data, the calculation of growth rate, the economic behavior of arts organizations, and performing arts sponsors and presenters. (RM)

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GROWTH OF ARTS AND CULTURAL ORGANIZATIONS IN THE DECADE OF THE 1970's

Final Report

December 1983

A Study Prepared for

Research Division
National Endowment for the Arts
in Accordance With
Contract No. NEA PC 80-29

By

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SO 015 413

PREFACE

This study was conducted under contract to the National Endowment for the Arts (NEA PC 80-29) as a "Study of the Growth of Nonprofit Arts and Cultural Organizations in the Decade of the 1970's. At the outset, we set stringent quality requirements for our work and conducted the study under strict standards, mindful that the acquisition of knowledge in this area of research began before and will continue after this project.

We extend our thanks to Messrs. Harold Horowitz, Director of the Research Division; his project officers John Shaffer, Bill Potter, and Tom Bradshaw; and all of the National Endowment for the Arts staff who extended their complete cooperation to us in this project. We were fortunate to have the cooperation of over 200 individuals from arts institutions and arts service organizations who provided us with the vast amount of data or background materials and generously took the time to share with us their knowledge of the arts field. Our debt to them is only vaguely reflected in the footnotes and references scattered throughout this report. Without the assistance of these numerous individuals, too numerous to individually list, this study would have been impossible to complete.

Our special thanks go to Ms. Evelyn Swarr who processed again and again all the words and numbers in this report.

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EXECUTIVE SUMMARY

STUDY OF GROWTH OF ARTS AND CULTURAL ORGANIZATIONS IN THE DECADE OF THE 1970's

The study of growth of arts organizations had its beginnings only about 15 years ago with the seminal work on performing arts by Baumol and Bowen: Performing Arts: The Economic Dilemna.[1] The late 1960's saw much discussion on the needs and condition of the arts, but except for orchestras,[2] the data on nonprofit arts organizations that existed could not truly address the question of whether organizations were growing or improving in economic terms. In the art forms of opera and museums, data had been collected, but it lacked the consistency needed to analyze change over time.

The decade of the 1970's saw increasing interest in data about the arts. The Ford Foundation conducted its study The Finances of the Performing Arts[3] which collected and analyzed data on professional orchestras, opera companies, resident theater companies, and ballet and modern dance companies for the fiscal years 1966-1971.[4] Service organizations began collecting data on their member organizations on a systematic, annual basis. The second half of the decade saw an explosion in the number of service organizations founded. Many of these began collecting information on the organizations in the fields they serve. In addition to service organizations, government agencies and commissioned studies collected data on arts and cultural organizations.

The purpose of this study was to analyze the disparate data on nonprofit arts organizations in the 1970's to construct a more comprehensive picture of the growth of the arts. Specifically, the tasks of this study were to assemble, assess, edit, and analyze available data sets on the

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[1] Baumol, William J., and Bowen, William G. Performing Arts: The Economic Dilemna, Twentieth Century Fund, 1966.

[2] The American Symphony Orchestra League, Washington, D.C., has been collecting financial and operational statistics from member orchestras since the early 1950's.

[3] Ford Foundation. The Finances of the Performing Arts, Vols. I and II, New York, 1974.

[4] The Ford Foundation collected an additional three years of data (FY72 through FY74), but never published this data.

1970's relevant to the development of the arts to determine changes in and rates of growth of various aspects of arts organizations, and to produce a review of the decade.

The results of assessing the vast amount of information and data that were assembled revealed that very little data were consistent enough or were collected on a systematic enough basis to allow analysis, except in a most cursory manner. In only three art forms (orchestras, operas, and theaters) were data available on any group of organizations for the full ten years of the decade.[5/] For dance companies, 5 years of data were available. For museums, no data base of annual data was found.

To address the question: what were the rates of growth of the arts?, data on a uniform group of organizations collected for every year of the decade were required. In addition, the data had to be defined in the same way and measuring the same thing for each and every year. Otherwise, it is impossible to know whether observed changes reflect variances in how the data were collected or from whom they were collected, or whether those variances actually measure some change that occurred in those organizations.

At the outset of this study, a decision was made to spend the bulk of the time and energy doing a rigorous analysis, rather than a broad brush overview of all data which might produce an inaccurate picture. Therefore, much effort was spent editing data on orchestras, operas, and theaters and on creating a ten-year data base for dance and museums (museums as an institutional art form are the largest economic group in the arts and

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[5/] Much of FY1980 data was not available until mid to late 1981 or later. Thus, the years 1970 through 1979 were used for the decade.

cultural organization industry and thus could not be left out, even though no annual data base on which to build was found). In orchestras, the task of editing the data from the American Symphony orchestra League was a relatively simple one, since data had been collected on a similar basis for all ten years. In fact, for one group of 17 large orchestras, consistent data were available back until the early 1950's. This 30 year set of data was used to give a broader overview of the arts by setting the 1970's into a historical perspective. For operas and theaters, the task was one of hooking two disparate data bases together by carefully assessing differences and correcting those that were found. Ford Foundation data were used for the first five years for these two art forms. OPERA America and the Theatre Communications Group provided data for the second half of the decade. In both cases, the mid 70's presented problems in data consistency, but the quality of the data improved markedly during the last years of the decade. The task in the dance art form, since no data base could be found on the second half of the decade, was to extend the Ford Foundation data base. This was done using financial statements of the dance companies. Since no data base existed for museums, the task was to collect financial statements for a group of museums for all ten years and create a uniform data base from these.

Because of the lack of quality data and the enormity of the editing task to create quality data, the one additional analytic task (besides looking at growth rates) that was completed was an attempt to find an estimate of the total number of organizations in the arts and cultural fields and give an estimate of the total economic (dollar) size of this "industry." The methodology used was one of trying to get accurate counts or estimates of the number of organizations in each art form from individuals or organizations in the arts field, eliminate any known overlap among art forms, and then add up the estimates to arrive at a grand total. By using average sizes (or ranges) of the operating expenses of the organizations within each discipline, an estimate of the total dollar size of the arts and cultural universe was made. Other analyses, such as changes in audience characteristics and changes in geographical distribution could not be performed on a global nature even within a discipline. Since simply trying to count the number of organizations at one point in time proved difficult, describing their characteristics would have required an effort beyond the scope of this study.

The Universe of Arts and Cultural Organizations

The result of the attempt to count the number of organizations and estimate the dollar size of the industry is shown in Figure 1. Toward the end of the decade of the 1970's, the estimate of the number of arts and cultural organizations is approximately 20,000 organizations with an economic size of roughly $2 billion. These include avocational and amateur groups (where an estimate by someone in the field was available). Sponsoring and presenting organizations (except museums) which sponsor other performing or visual artistic groups are excluded from the count. Their inclusion would result in double-counting performances and the associated economic activity. (However, Appendix F of the report is a presentation and discussion of the data found on sponsoring and presenting organizations.)

Performing organizations numbered about 10,600 and measured an estimated $833 million. Museums number about 4,400 and generated an economic size of over $1 billion ($1,017 million). Other visual and literary organizations numbered about 4,700 and measured an estimated $92 million. Many of these organizations were founded during the 1970's, and there appears to have been real growth throughout these art forms. However, for the reasons described above, the amount of growth cannot be accurately measured. No universe estimate was possible for the beginning of the decade (except in operas, museums, and literature) because of the lack of data. For these three art forms, the beginning and end of the decade found the following numbers of organizations:

	Year and Number of Organizations	
Operas	1970: 648	1980: 986
Museums	196[illegible]: 2,889	1978: 4,408
Literature	1967: 668	1980: 3,082

Framework of Analysis

To understand the analysis of the growth of arts organizations, an economic framework with several new concepts is provided. In their economic analysis of the performing arts, Baumol and Bowen[6/]

[6/] Baumol and Bowen, Op. cit.

THE ARTS AND CULTURAL UNIVERSE: MUSEUMS AND PRODUCING ORGANIZATIONS

Year of Data	Discipline	Fully Professional/Larger Organizations: Number of Organizations	Fully Professional/Larger Organizations: Total $ (000's)	Fully Professional/Larger Organizations: Criterion For Inclusion	All Organizations/Groups: Number of Organizations	All Organizations/Groups: Total $ (000's)
1980	ORCHESTRA	176	252,134	$100,000	1,505	237,599
1980	OPERA	109	133,600	$100,000	779	148,900
1977	THEATER 1980 Data for "Fully Professional"	300	116,600	potential constituency of TCG	5,545	238,896
1980	MUSICAL THEATER 1977 data for "Fully Professional"	71	64,381	NOI Universe	included in Theater	
1978	DANCE (including Mime)		?		460	60,000
1980	CHORAL MUSIC	98	14,210	APVE profes. or profes. church	1,100	22,487
1980	CHAMBER MUSIC		?		1,000	13,940
1977	JAZZ MUSIC & OTHER PERFORMING ARTS		?		214	75,043
SUBTOTAL: PERFORMING ARTS		Too many missing			10,603	832 865
1979	MUSEUMS	1,396	934,375	$100,000	4,[illegible]08	1,016,793
1978	NEW ARTS/ALTERNATIVE SPACES		?		500	11,700
1978	MEDIA ARTS ORGANIZATIONS		?		500	10,000
1980	LITERATURE		?		2,500	37,500
1978	CRAFTS MEMBERSHIP ORGANIZATIONS	80	22,200	$100,000	1,218	33,200
SUBTOTAL: MUSEUMS, VISUAL ARTS, AND LITERATURE		Too many missing			9,126	1,109,193
TOTAL: MUSEUMS AND PRODUCING ORGANIZATIONS					19,729	$1,942,058

FIGURE 1

introduced the concept of ever-increasing need for support of performing arts organizations. Ever since, analysis of the arts has focused on the earnings gap: the difference between expenditures and earned income.

While the central proposition of the Baumol and Bowen study—the natural tendency of the earnings gap to widen as the "inescapable result of the technology of live performance"[7]—is certainly correct, it covers only a part of the story. We must also take into account the widening of the gap due to an increase in output. At the same level of output, there is a natural tendency for the earnings gap to widen as a result of the technology of live performance, allowing for only limited increases in productivity. This we call its natural growth. In addition, any increase in the output will also increase the earnings gap. This implies that any measure of the growth rate of the earnings gap contains two elements, its natural growth and its growth due to an increase in output, which we call its output growth. Hence, in order to measure the natural growth of the earnings gap, output must remain constant. Indeed, this is the true measure of the underlying growth rate that the logical structure of the Baumol and Bowen thesis dictates.

It should be noted that output in the arts not only consists of the number of performances, a "quantity" dimension, but also has a "quality" dimension. A Beethoven symphony played by the Chicago Symphony Orchestra is not identical to the same symphony played by a high school orchestra. Some determinants of quality are the number of players, the quality of players, the amount of rehearsal time, and even the physical setting of the performance. Given a constant level of earned income, an increase in output will increase the earnings gap even in the absence of natural growth. This is the second segment of the growth of the earnings gap.

A natural question arises: what allows the growth of the earnings gap to continue? Obviously, an organization cannot incur a deficit for very long, and this points to the contributions that must fill the gap. Without them, output cannot grow and even the natural growth of player wages cannot be met.

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[7] Ibid. p. 162

Researchers have usually looked at only one side of the coin—growth of costs, forgetting that the other side consists of contributions. Without contributions, there is no earnings gap. If, for example, a donor contributes $1 million to an arts organization, its earnings gap can be increased by $1 million. On the other hand, when contributions slacken, the organization is forced to contract and decrease the gap. This points to a new interpretation of the earnings gap.

Traditionally, the total national earnings gap of the (performing) arts has been interpreted as "the amount which, at the present time, society must be prepared to contribute, by some means, if the nation's existing performing arts organizations are to be kept solvent."[8/] Thus, projections of large growth rates of the earnings gap have served as the rationale for more support for the arts especially from government.[9/] Using this reasoning, it would imply that projection of a smaller growth rate indicates less need for support of the arts.

Our analysis indicates that precisely the contrary is usually true. Growth rates of the earnings gap above the natural growth rate indicate an expansion of the arts and are a sign of good health, while those below the natural growth rate can be an indication of contraction and poor health for the arts.[10/] This expansion and contraction can take the form of changes in both quantity and quality.

Our expansion of the Baumol and Bowen thesis and the resultant interpretation of the earnings gap has led to some major conclusions and policy implications:

- Any growth of the earnings gap greater than the natural growth rate may be a sign of good health for the arts. Thus, a large growth of the earnings gap need not necessarily be interpreted as a sign of poor conditions.

- Within the same class of organizations, older, more established arts organizations, in general, have smaller growth rates than newer, less established ones.

[8/] Ibid. pp. 150-151

[9/] See Ford Foundation, op. cit. p. 104

[10/] This is not always the case when there are changes in earned income or there is a deficit.

- The earnings gap can grow only if there are contributions to fund that growth. If we want to obtain a comprehensive analysis of the condition of the arts, we must take a closer look at the growth of contributions and its relationship to the earnings gap.

Growth in Arts Organizations

How did arts organizations grow over the decade of the 1970's and how did this compare to the preceding years? The first two columns of Figure 2 present the growth rates (in constant dollars) of total expenses and the earnings gap as calculated by the Ford Foundation for FY66-FY71 and by this study for the decade FY70-FY79, for similar samples of the various performing arts: symphony orchestras, operas, theaters, ballet and modern dance companies. (Although museums were not included on this figure, as no previous growth rates were available, this study shows that their growth parallels that of the performing arts.)

Two major observations emerge from Figure 2:

- the same range of growth occurred for all the groups except for the "young" modern dance companies, and

- all performing art forms (save opera) grow at a slower pace in the 1970's, especially symphony orchestras.

To understand the overall picture, one must look at the determining factor: contributions. The third column of Figure 2 presents the growth rates of support income for all groups over the decade. The earnings gap growth rates for opera and modern dance were large because their support income growth rates were large. Orchestras had a rather small growth rate for the earnings gap because support income grew at a slow rate. This was a great change from the large rate of the Ford Foundation, induced by the Ford Foundation symphony program.

But just as contributions largely determine the rate of growth of the organizations and their earnings gaps, so can they determine the pattern of growth. For example, in the late 1960's, the Ford Foundation symphony program led the major orchestras to dip into their endowments in order to

GROWTH RATES OF VARIOUS ART FORMS
FORD FOUNDATION AND 70'S DECADE STUDIES

	FORD FOUNDATION **			70's DECADE			70's DECADE	
Art Form	Number of Orgs.	Growth Rate of Expenses	Growth Rate of Earnings Gap	Number of Orgs.	Growth Rate of Expenses	Growth Rate of Earnings Gap	Growth Rate of Support Income	Growth Rate of Total Income
Orchestra	91	6.9%	13.0%	143	3.6%	3.3%	3.2%	3.7%
Opera *	30	5.0	5.6	20	6.6	9.3	8.1	6.1
Theater	27	3.3	12.3	18	6.1	3.7	3.7	6.1
Ballet	9	10.4	8.7	8	6.6	3.7	2.6	6.0
Modern Dance	8	19.0	8.1	5	17.7	22.2	23.3	18.2

* Opera is without the Metropolitan Opera

** Ford Foundation. The Finances of the Performing Arts. New York, 1974.

FIGURE 2

cover large deficits in their operating funds. Likewise in the mid 1970's, museums invaded their endowments to cover deficits. In the decade of the 1970's, several major institutional contributors (the Ford and Mellon Foundations and the National Endowment for the Arts) decided on a new concept of securing the long term financial stability of the organizations and used grant programs to shape their financial behavior.

A major development of the 1970's reflected repeatedly in the background materials was the increased recognition of the need for financial management in the arts. The observed result from the data was that the surplus/(deficit) position of the organizations was better at the end of the decade than at the beginning or in the middle, i.e., the overall deficits were lower and/or more organizations had (larger) surpluses. This, of course, varied from art form to art form. Some groups had large deficits in the beginning of the decade; some had a pattern of surpluses in the beginning and deficits in the middle. However, the general trend was toward a better bottom-line financial position at the end of the decade. Where deficits continued, they became smaller and the fluctuation from year to year decreased.

This control of the deficits seems to reflect tighter management stemming not only from cost control but in part from:

- an increase in non-traditional sources of earned income (especially from concessions, sales, and other auxiliary activities) and
- a stronger emphasis on more professional development to provide on-going contributed support.

In seeking long term solutions to financial problems of the arts, large grant programs (Ford and Mellon Foundations and the National Endowment for the Arts' Challenge Grant Program) mandated tighter management and spurred the growth of non-operating funds, e.g., endowment. The growth of endowments allow more flexibility in management and can help sustain operating deficits. This was the picture seen in museums, where operating funds generally grew more quickly than did the museums' total funds and deficits occurred more frequently. This trend of building endowments and other non-operating funds is a result of the concern for long term financial health in the arts.

Returning to the earning gap, was the gap's smaller rate of growth (as seen in Figure 2) over the 70's decade (and the better bottom-line position of the organizations) a sign of better conditions? Or was there rather a countervailing reduction in output? Although it is difficult to obtain a measure of output -- especially in terms of quality -- some indications are available. At the end of the decade, 17 Major Orchestras reduced the total number of performances, especially those by the full orchestra. And many artistic directors complained about the lack of funds for innovation and experimentation. In 1980 the situation was:

> "At present, according to Davidson (Artistic Director of Mark Taper Forum), new play activity for work that is unsuited to the main stage has dwindled because it is too costly -- full productions in a 99 seat laboratory theater are simply not economically feasible. In other vital growth areas, the Taper has not been able to increase actor salaries or institute an extra week of rehearsal...
>
> ...If one looks back, the economic effect on production has already been felt: In 1967 Arena's (Arena Stage) "The Great White Hope" was done with 62 actors and 237 costumes. That production would be impossible today, says (Zelda) Fichandler (Producing Director)..."[11]

Artistic output seems to have been the victim of the 1970's.

Data Collection In the Arts

In the process of conducting the study, several lessons were learned regarding data collection methodology in the arts. There is a need to more systematically classify organizations by some widely accepted taxonomy that would create mutually exclusive types of organizations. If the arts field used such a taxonomy, consistency across data collection studies might be possible.

Another problem is the difficulty in segregating for analysis the economic data for arts organizations that are a part of a college or university or other larger nonprofit organization, or are part of state or municipal/county governments. The exclusion of these organizations and/or part of their economic activity undercounts the contribution made by the arts. Often, these arts organizations receive significant in-kind contributions of space, salaries, and other types of expenses. Data collection should, therefore, make some attempt to estimate the full economic activity of these organizations.

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[11] Mayleas, Ruth Rothschild. "Foreward." *Theatre Facts 80*. Theatre Communications Group, 1981.

The data available from arts organizations are frequently of questionable quality. This is a continuing problem. A specific problem in securing a comprehensive picture of the arts field is that data are not usually available for non-operating funds (endowment and plant funds). This translates into an inability to track transfers to and from operating funds and income into the plant and endowment funds. Excluding these funds understates support (unearned income), especially private support. It given an arbitrary picture of operations, because there are no rigorous definitions for what is included and what is excluded from operating funds. Furthermore, as more arts organizations build endowments, this area of economic activity should be captured in data collection on finances.

The frustration at the lack of consistent data which plagued this study should be much alleviated if this study is repeated for the decade of the 1980's. For a number of developments in the last years of the 1970's and continuing into the 1980's will reap benefits. The accounting profession spent much of the 70's decade studying how nonprofit organizations should report their finances. The guidelines developed and the reporting formats recommended should provide vastly more consistent data. For museums, guidelines were developed in the middle of the 1970's, and the results were greater uniformity found among museums' financial statements in the latter years of the 1970's. Furthermore, at the end of the decade, the Internal Revenue Service redesigned its Form 990 (Report of Organizations exempt from Income Tax). This may provide a source of consistently defined data for the 1980's. (Although getting data directly from the IRS will continue to be problematic, the Form 990 could be requested directly from the organizations themselves.)

Service organizations have recognized the need for and the benefits of data. A combination of more service organizations, greater interest in data, and the increasing quality of data collected should all provide a greater wealth of data in the future. However, there seems to be an increasing trend of service organizations not wishing to share their data except in aggregated form. The ability of bona fide researchers to accurately analyze data is greatly reduced if individual organization data cannot be used.

Finally, there continue to be national organizations who wish to collect data, such as the National Assembly of State Arts Agencies and the National Center for Charitable Statistics, Institute of Museum Services, and the National Endowment for the Arts. This study applauds all efforts to gather data that is of high quality (i.e., reliable, consistent, well defined, etc.) because the result may be a study of the 1980's that will go far beyond what was possible for the 1970's.

CHAPTER 1

PURPOSE, METHODOLOGY, AND MAJOR CONCLUSIONS OF THE STUDY

Numerous and essentially unconnected data collection efforts in the arts were carried out during the decade of the seventies, and produced data on the economic condition and level of activity of arts organizations in many artistic disciplines.

The data sets varied widely. Some data sets covered multiple years. Other collection efforts provided data for only one year. Some included data for organizations in more than one artistic discipline, while others provided data for one type of organization only. Organizations on which data were collected often varied widely within the same disciplines, and most data collection efforts covered only subsets of organizations within a discipline.

Most important, the purposes for which the data were gathered varied. Each effort served a specific and limited purpose or audience. During the decade, few attempts were made to collectively analyze the data bases in order to expand their usefulness beyond their original purpose. Audiences such as policy planners, decision makers, and researchers interested in a broader scope of information about the economic conditions and level of activity of arts organizations were not served by these data collection efforts.

PURPOSE OF THE STUDY

This study, The Growth of Arts Organizations in the Decade of the 1970s, was designed to systematically and critically analyze these variant data bases to provide a comprehensive picture of the growth of the arts during that period. The specific purpose of the study was to portray, where possible, the rate of growth and change in the number of institutions and in the level of output, employment, income, and expenses, organized according to major art form and institutional characteristics.

The audiences for the data are arts policymakers, planners, and researchers. To adequately address these audiences, the study needed to provide reliable results to furnish support for decisions and further research, nontechnical conclusions, as well as through technical discussions to serve the needs of the varied audiences, and data on a full range of variables and disciplines to satisfy the need for a broad view of the arts.

APPROACH

To achieve the purposes of the study, a technical approach was designed to accomplish the following:

- Uncover and collect as much data as possible.
- Critically assess the data to determine whether sufficient reliability, validity, and clarity existed to support calculation of reliable growth rate measures.
- Select and edit data for rigorous analysis, including removing as many impurities as possible and imputing missing data.
- Calculate growth rates and absolute changes.
- Project changes, where possible, to the universe of arts organizations within an artistic discipline.
- Analyze data within a unified framework.
- Assemble and present in a simplified manner data that do not meet the standards of reliability and validity required for the calculation of growth rates.

The thrust of the work was directed toward the more rigorous analyses of data bases. This choice in approach reflected a concern for accurate analysis of data from the 1970s to use as a basis for guiding policy and research for the 1980s.

METHODOLOGY

The technical approach was implemented in a series of eight tasks. The methodology used in these tasks is described below.

Task 1 - Set Priorities and Develop Analysis Plan

The first task was to set priorities regarding the data bases on which to focus the primary attention of the study. From this effort, a broad analysis plan was developed. It was agreed that a comprehensive effort would be made to identify and obtain as many data bases as possible.

There was an initial recognition that growth rate measurement would be attempted for five more organizationally eatablished art forms: Orchestras, Operas, Theater, Dance (Ballet and Modern Dance Companies), and Museums. Since no time-series data set existed for museums or for the last 5 years of the decade for ballet or modern dance companies, it was decided that a data set would be created for these disciplines through the collection of financial statements from samples of these types of organizations.

Task 2 - Identify Data Sources and Obtain Data Sets

The search for data sets started from information already known by the project staff and the documentation available to them and from sources suggested by the Research Division of the National Endowment of the Arts. Project staff supplemented these inputs through telephone contact with service organizations in the various artistic disciplines, individual researchers in the arts field, and government agencies.

Sources with data were asked to send copies to the project. In addition, the NEA Library was extensively searched and copies were made of all relevant data and background materials. Nearly all data sets initially identified and sought were obtained and subsequently categorized by types of analysis and disciplines as follows:

Those to be Utilized in Growth Rate Measurement

- Orchestras
- Operas
- Theater
- Ballet and Modern Dance Companies[1]
- Museums[1]

Those to be Assembled and Presented

- Orchestras[2]
- Opera and Musical Theater Comanies[2]
- Theater Companies[2]
- Ballet/Modern Dance Companies[2]
- Museums
- Choral Music Groups
- Chamber Music Groups
- Other Performing Arts Groups
- Visual Arts Organizations/New Arts Space/Alternative Space
- Media (Arts) Centers
- Crafts Membership Organizations
- Literature Organizations
- Other Arts Organizations
- Arts Sponsors/Presenters
- Sources of Funding/General Support for the Arts

Discussion of analyses on data sets in this latter group is not presented as part of this report. However, information on these is available from the Research Division, National Endowment for the Arts.

For the growth rate data bases, annual data collected in some detail with some consistency on a common set of organizations were needed for all years in the decade.

For orchestras, this data base existed in the annual statistics collected by the American Symphony Orchestra League from the early 1960s[3] In addition, this source represented the universe of professional orchestras in the United States. For opera, theater, and dance, the Ford Foundation data base was used for the first 5 years of the decade. The opera data base was completed with data obtained from OPERA America's annual survey statistics. The theater data base was completed and supplemented with annual survey data from the Theater Communications Group. Since no similar data souce existed for dance, financial statements were obtained for the remaining years in the decade from most of the companies in the Ford Foundation sample. For museums, no data base existed. Therefore, lists of candidate organizations were prepared through consultation with the American Association of Museums, the Institute of Museum Services, and the Museum Program of the National Endowment for the Arts. A small sample was selected to represent the varied types of museums with art collections in the field. Financial statements or annual reports were obtained for as many of these organizations as possible from the Smithsonian and National Gallery of Art libraries, and then statements for missing years and/or missing organizations were requested directly from the museums themselves.

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[1] Primary data base created through financial statements (see Task 3).

[2] Additional data not used directly in measurement of growth rates.

[3] Proper citations for and discussions for the data sources can be found in Chapters 3 and 5 through 9.

A wide variety of additional sources with data for single points in time for certain groups of organizations was used to construct the universe of arts and cultural organizations.

Task 3 - Create Data Bases

Data for a sample of 45 museums were selected on which to collect financial statements in an effort to create a suitable data base for measuring growth among museums. Some museums could not provide financial statements. The final data base contained 33 museums.

Data for a sample of 10 ballet companies and 6 modern dance companies were available from the Ford Foundation study for 1970 through 1974. Financial statements were requested from these companies to complete the data base for the second half of the decade. Ten ballet companies and five modern dance companies provided financial statements, forming a data base on which growth rates could be calculated.

Task 4 - Assess Data Bases

As data sets were received, the following information was determined for each:

- Year represented
- Size, rating and geographic distribution of respondent universe
- Coverage of universes presented by respondents
- Data elements/variables included
- Formats in which the data were available
- Reliability and validity of data

Data sets were assessed to determine whether they could be used for calculation of growth rates (for orchestras, operas, theaters, dance companies, and museums) or would be used only for supporting analyses or for simple assembly and presentation. The assessment of the data bases resulted in a set of data in each of the major artistic disciplines for selected variables for which growth rate measurements could be calculated.

Task 5 - Edit, Combine, and Build Data Bases

Data selected from each data base for use in measuring growth rates (in the five disciplines mentioned above) were edited to insure internal consistency (from organization to organization and from year to year) and to correct any detected errors. Where possible, data were verified with other sources. When a clean data base was created for each sample of organizations, data bases were combined within disciplines to provide a consolidated data base for the 10-year period.

Combining data across data bases within a discipline required that two types of problems be overcome:

- Inconsistency or lack of data item definitions
- Inconsistency in definition of organizational entities represetned in the data

These problems required that judgments be made in order to match data across data sets. In addition, some organizations did not report data for certain items. Where possible, these data were imputed.

Once a clean data base was prepared, the data were keyed and a computer file was created for each of the five art forms. These computer data files were used to calculate growth rates.

Task 6 - Measure Growth Rates

Growth rates for the vaiables in the five data bases were calculated for relevant years, using economic data as reported and as adjusted for inflation. Growth rates were calculated over a 10-year period, 1970 through 1979, except where noted.

Task 7 - Measure Change in the Universe

The next task was to take the growth rates measured for the sample of organizations included in the data base and prepare an estimate of growth in each of the artistic discipline universes. The problem was to assess the degree to which the sample of organizations on which the growth rates were calculated represented the universe of organizations in each discipline.

This problem has two parts. First, there is little agreement as to the identification of which organizations or how many constitute the "true" universe in any of the artistic disciplines studied. Second, the samples used for the calculation were usually not systematically drawn from any "universe," but came from other groupings of organizations. The degree to which these groupings match the "true" universe obviously affects the degree to which the sample is representative of the "true" universe.

Only in the orchestra universe could some reasonably systematic estimate of growth rates of the universe be made. In some of the other artistic disciplines, estimates were made where possible through a presentation of the observed sample growth rates and a judgment analysis of how representative of the universe these observed values might be. The process for the analysis has been described in each chapter addressing the growth rates.

Task 8 - Analyze and Interpret Results and Prepare Final Report

The calculated growth rates were analyzed according to the framework (presented in Chapter 4) by type and budget size of organizations in each of the five artistic disciplines. The results were interpreted to assess the growth of these types of arts organizations (Chapters 5 though 9). An estimate of the total universe of arts organizations was constructed (Chapter 3). Then, the report was prepared. A summary of the conclusions of the study is presented in the next section.

AREAS NOT ADDRESSED IN THIS REPORT

A detailed comprehensive picture of all types of arts organizations, employment in the arts, audience growth, and so on was not possible. This study was limited by the resources available. Also, much of the data for many areas of investigation either do not exist or are of such questionable quality as to be useless. Variation from year to year for much data was enough to make it impossible to discern actual change from changes in data collecton.

The following areas of investigation produced no or few concrete results because of the lack of adequate consistent data over the decade:

- o Regional geographic changes in numbers of organizations
- o Employment by arts organizations and related to growth of those organizations

The following areas were excluded because of the time and resources available:

- o Audience studies and size of audience of the arts. Many studies exist, but there is no systematic way to easily relate this to the growth of organizations.

- o Philanthropy. Data on government and private giving from the donor perspective is readily available. However, relating this to specific growth of organizations is not possible, except in a cursory manner.

CONCLUSIONS

Conclusions are presented regarding on the overall arts picture, each of the five major artistic disciplines, and data collection in the arts.

The Universe of Arts and Cultural Organizations

The result of the attempt to count the number of organizations and estimate the dollar size of the industry is shown in Figure 1. Toward the end of the decade of the 1970's, the estimate of the number of arts and cultural organizations is approximately 20,000 organizations with an economic size of roughly $2 billion. These include avocational and amateur groups (where an estimate by someone in the field was available). Sponsoring and presenting organizations (except museums) which sponsor other performing or visual artistic groups are excluded from the count. Their inclusion would result in double-counting performances and the associated economic activity. (However, Appendix F of the report is a presentation and discussion of the data found on sponsoring and presenting organizations.)

Performing organizations numbered about 10,600 and measured an estimated $833 million. Museums number about 4,400 and generated an economic size of over $1 billion ($1,017 million). Other visual and literary organizations numbered about 4,700 and measured an estimated $92 million. Many of these organizations were founded during the 1970's, and there appears to have been real growth throughout these art forms. However, for the reasons described above, the amount of growth cannot be accurately measured. No universe estimate was possible for the beginning of the decade (except in operas, museums, and literature) because of the lack of data. For these three art forms, the beginning and end of the decade found the following numbers of organizations:

	Year and Number of Organizations	
Operas	1970: 648	1980: 986
Museums	1966: 2,889	1978: 4,408
Literature	1967: 668	1980: 3,082

Framework of Analysis

To understand the analysis of the growth of arts organizations, an economic framework with several new concepts is provided. In their economic analysis of the performing arts, Baumol and Bowen[6/]

6/ Baumol and Bowen, Op.cit. 1-9

THE ARTS AND CULTURAL UNIVERSE: MUSEUMS AND PRODUCING ORGANIZATIONS

		Fully Professional/Larger Organizations			All Organizations/Groups	
Year of Data	Discipline	Number of Organizations	Total $ (000's)	Criterion For Inclusion	Number of Organizations	Total $ (000's)
1980	ORCHESTRA	176	252,134	$100,000	1,505	237,599
1980	OPERA	109	133,600	$100,000	779	148,900
1977	THEATER 1980 Data for "Fully Professional"	300	116,600	potential constituency of TCG	5,545	238,896
1980	MUSICAL THEATER 1977 data for "Fully Professional"	71	64,381	NOI Universe	included in Theater	
1978	DANCE (including Mime)		?		460	60,000
1980	CHORAL MUSIC	98	14,210	APVE profes. or profes. church	1,100	22,487
1980	CHAMBER MUSIC		?		1,000	13,940
1977	JAZZ MUSIC & OTHER PERFORMING ARTS		?		214	75,043
SUBTOTAL: PERFORMING ARTS		Too many missing			10,603	832,865
[illegible]79	MUSEUMS	1,396	934,375	$100,000	4,408	1,016,793
1978	NEW ARTS/ALTERNATIVE SPACES		?		500	11,700
1978	MEDIA ARTS ORGANIZATIONS		?		500	10,000
1980	LITERATURE		?		2,500	37,500
1978	CRAFTS MEMBERSHIP ORGANIZATIONS	80	22,200	$100,000	1,218	33,200
SUBTOTAL: MUSEUMS, VISUAL ARTS, AND LITERATURE		Too many missing			9,126	1,109,193
TOTAL:	MUSEUMS AND PRODUCING ORGANIZATIONS				19,729	$1,942,058

FIGURE 1-1

introduced the concept of ever-increasing need for support of performing arts organizations. Ever since, analysis of the arts has focused on the earnings gap: the difference between expenditures and earned income.

While the central proposition of the Baumol and Bowen study—the natural tendency of the earnings gap to widen as the "inescapable result of the technology of live performance"[7]—is certainly correct, it covers only a part of the story. We must also take into account the widening of the gap due to an increase in output. At the same level of output, there is a natural tendency for the earnings gap to widen as a result of the technology of live performance, allowing for only limited increases in productivity. This we call its natural growth. In addition, any increase in the output will also increase the earnings gap. This implies that any measure of the growth rate of the earnings gap contains two elements, its natural growth and its growth due to an increase in output, which we call its output growth. Hence, in order to measure the natural growth of the earnings gap, output must remain constant. Indeed, this is the true measure of the underlying growth rate that the logical structure of the Baumol and Bowen thesis dictates.

It should be noted that output in the arts not only consists of the number of performances, a "quantity" dimension, but also has a "quality" dimension. A Beethoven symphony played by the Chicago Symphony Orchestra is not identical to the same symphony played by a high school orchestra. Some determinants of quality are the number of players, the quality of players, the amount of rehearsal time, and even the physical setting of the performance. Given a constant level of earned income, an increase in output will increase the earnings gap even in the absence of natural growth. This is the second segment of the growth of the earnings gap.

A natural question arises: what allows the growth of the earnings gap to continue? Obviously, an organization cannot incur a deficit for very long, and this points to the contributions that must fill the gap. Without them, output cannot grow and even the natural growth of player wages cannot be met.

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[7] Ibid. p. 162

Researchers have usually looked at only one side of the coin—growth of costs, forgetting that the other side consists of contributions. Without contributions, there is no earnings gap. If, for example, a donor contributes $1 million to an arts organization, its earnings gap can be increased by $1 million. On the other hand, when contributions slacken, the organization is forced to contract and decrease the gap. This points to a new interpretation of the earnings gap.

Traditionally, the total national earnings gap of the (performing) arts has been interpreted as "the amount which, at the present time, society must be prepared to contribute, by some means, if the nation's existing performing arts organizations are to be kept solvent."[8/] Thus, projections of large growth rates of the earnings gap have served as the rationale for more support for the arts especially from government.[9/] Using this reasoning, it would imply that projection of a smaller growth rate indicates less need for support of the arts.

Our analysis indicates that precisely the contrary is usually true. Growth rates of the earnings gap above the natural growth rate indicate an expansion of the arts and are a sign of good health, while those below the natural growth rate can be an indication of contraction and poor health for the arts.[10/] This expansion and contraction can take the form of changes in both quantity and quality.

Our expansion of the Baumol and Bowen thesis and the resultant interpretation of the earnings gap has led to some major conclusions and policy implications:

- Any growth of the earnings gap greater than the natural growth rate may be a sign of good health for the arts. Thus, a large growth of the earnings gap need not necessarily be interpreted as a sign of poor conditions.
- Within the same class of organizations, older, more established arts organizations, in general, have smaller growth rates than newer, less established ones.

[8/] Ibid. pp. 150-151

[9/] See Ford Foundation, op. cit. p. 104

[10/] This is not always the case when there are changes in earned income or there is a deficit.

- The earnings gap can grow only if there are contributions to fund that growth. If we want to obtain a comprehensive analysis of the condition of the arts, we must take a closer look at the growth of contributions and its relationship to the earnings gap.

Growth in Arts Organizations

How did arts organizations grow over the decade of the 1970's and how did this compare to the preceding years? The first two columns of Figure 2 present the growth rates (in constant dollars) of total expenses and the earnings gap as calculated by the Ford Foundation for FY66-FY71 and by this study for the decade FY70-FY79, for similar samples of the various performing arts: symphony orchestras, operas, theaters, ballet and modern dance companies. (Although museums were not included on this figure, as no previous growth rates were available, this study shows that their growth parallels that of the performing arts.)

Two major observations emerge from Figure 2:

- the same range of growth occurred for all the groups except for the "young" modern dance companies, and

- all performing art forms (save opera) grow at a slower pace in the 1970's, especially symphony orchestras.

To understand the overall picture, one must look at the determining factor: contributions. The third column of Figure 2 presents the growth rates of support income for all groups over the decade. The earnings gap growth rates for opera and modern dance were large because their support income growth rates were large. Orchestras had a rather small growth rate for the earnings gap because support income grew at a slow rate. This was a great change from the large rate of the Ford Foundation, induced by the Ford Foundation symphony program.

But just as contributions largely determine the rate of growth of the organizations and their earnings gaps, so can they determine the pattern of growth. For example, in the late 1960's, the Ford Foundation symphony program led the major orchestras to dip into their endowments in order to

GROWTH RATES OF VARIOUS ART FORMS
FORD FOUNDATION AND 70'S DECADE STUDIES

	FORD FOUNDATION **			70's DECADE			70's DECADE	
Art Form	Number of Orgs.	Growth Rate of Expenses	Growth Rate of Earnings Gap	Number of Orgs.	Growth Rate of Expenses	Growth Rate of Earnings Gap	Growth Rate of Support Income	Growth Rate of Total Income
Orchestra	91	6.9%	13.0%	143	3.6%	3.3%	3.2%	3.7%
Opera *	30	5.0	5.6	20	6.6	9.3	8.1	6.1
Theater	27	3.3	12.3	18	6.1	3.7	3.7	6.1
Ballet	9	10.4	8.7	8	6.6	3.7	2.6	6.0
Modern Dance	8	19.0	8.1	5	17.7	22.2	23.3	18.2

* Opera is without the Metropolitan Opera

** Ford Foundation. _The Finances of the Performing Arts_. New York, 1974.

FIGURE 1-2

cover large deficits in their operating funds. Likewise in the mid 1970's, museums invaded their endowments to cover deficits. In the decade of the 1970's, several major institutional contributors (the Ford and Mellon Foundations and the National Endowment for the Arts) decided on a new concept of securing the long term financial stability of the organizations and used grant programs to shape their financial behavior.

A major development of the 1970's reflected repeatedly in the background materials was the increased recognition of the need for financial management in the arts. The observed result from the data was that the surplus/(deficit) position of the organizations was better at the end of the decade than at the beginning or in the middle, i.e., the overall deficits were lower and/or more organizations had (larger) surpluses. This, of course, varied from art form to art form. Some groups had large deficits in the beginning of the decade; some had a pattern of surpluses in the beginning and deficits in the middle. However, the general trend was toward a better bottom-line financial position at the end of the decade. Where deficits continued, they became smaller and the fluctuation from year to year decreased.

This control of the deficits seems to reflect tighter management stemming not only from cost control but in part from:

- an increase in non-traditional sources of earned income (especially from concessions, sales, and other auxiliary activities) and
- a stronger emphasis on more professional development to provide on-going contributed support.

In seeking long term solutions to financial problems of the arts, large grant programs (Ford and Mellon Foundations and the National Endowment for the Arts' Challenge Grant Program) mandated tighter management and spurred the growth of non-operating funds, e.g., endowment. The growth of endowments allow more flexibility in management and can help sustain operating deficits. This was the picture seen in museums, where operating funds generally grew more quickly than did the museums' total funds and deficits occurred more frequently. This trend of building endowments and other non-operating funds is a result of the concern for long term financial health in the arts.

Returning to the earning gap, was the gap's smaller rate of growth (as seen in Figure 2) over the 70's decade (and the better bottom-line position of the organizations) a sign of better conditions? Or was there rather a countervailing reduction in output? Although it is difficult to obtain a measure of output — especially in terms of quality — some indications are available. At the end of the decade, 17 Major Orchestras reduced the total number of performances, especially those by the full orchestra. And many artistic directors complained about the lack of funds for innovation and experimentation. In 1980 the situation was:

> "At present, according to Davidson (Artistic Director of Mark Taper Forum), new play activity for work that is unsuited to the main stage has dwindled because it is too costly — full productions in a 99 seat laboratory theater are simply not economically feasible. In other vital growth areas, the Taper has not been able to increase actor salaries or institute an extra week of rehearsal...
>
> ...If one looks back, the economic effect on production has already been felt: In 1967 Arena's (Arena Stage) "The Great White Hope" was done with 62 actors and 237 costumes. That production would be impossible today, says (Zelda) Fichandler (Producing Director)..."[11]

Artistic output seems to have been the victim of the 1970's.

Data Collection In the Arts

In the process of conducting the study, several lessons were learned regarding data collection methodology in the arts. There is a need to more systematically classify organizations by some widely accepted taxonomy that would create mutually exclusive types of organizations. If the arts field used such a taxonomy, consistency across data collection studies might be possible.

Another problem is the difficulty in segregating for analysis the economic data for arts organizations that are a part of a college or university or other larger nonprofit organization, or are part of state or municipal/county governments. The exclusion of these organizations and/or part of their economic activity undercounts the contribution made by the arts. Often, these arts organizations receive significant in-kind contributions of space, salaries, and other types of expenses. Data collection should, therefore, make some attempt to estimate the full economic activity of these organizations.

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[11] Mayleas, Ruth Rothschild. "Foreward". Theatre Facts 80. Theatre Communications Group, 1981.

The data available from arts organizations are frequently of questionable quality. This is a continuing problem. A specific problem in securing a comprehensive picture of the arts field is that data are not usually available for non-operating funds (endowment and plant funds). This translates into an inability to track transfers to and from operating funds and income into the plant and endowment funds. Excluding these funds understates support (unearned income), especially private support. It given an arbitrary picture of operations, because there are no rigorous definitions for what is included and what is excluded from operating funds. Furthermore, as more arts organizations build endowments, this area of economic activity should be captured in data collection on finances.

The frustration at the lack of consistent data which plagued this study should be much alleviated if this study is repeated for the decade of the 1980's. For a number of developments in the last years of the 1970's and continuing into the 1980's will reap benefits. The accounting profession spent much of the 70's decade studying how nonprofit organizations should report their finances. The guidelines developed and the reporting formats recommended should provide vastly more consistent data. For museums, guidelines were developed in the middle of the 1970's, and the results were greater uniformity found among museums' financial statements in the latter years of the 1970's. Furthermore, at the end of the decade, the Internal Revenue Service redesigned its Form 990 (Report of Organizations exempt from Income Tax). This may provide a source of consistently defined data for the 1980's. (Although getting data directly from the IRS will continue to be problematic, the Form 990 could be requested directly from the organizations themselves.)

Service organizations have recognized the need for and the benefits of data. A combination of more service organizations, greater interest in data, and the increasing quality of data collected should all provide a greater wealth of data in the future. However, there seems to be an increasing trend of service organizations not wishing to share their data except in aggregated form. The ability of bona fide researchers to accurately analyze data is greatly reduced if individual organization data cannot be used.

Finally, there continue to be national organizations who wish to collect data, such as the National Assembly of State Arts Agencies and the National Center for Charitable Statistics, Institute of Museum Services, and the National Endowment for the Arts. This study applauds all efforts to gather data that is of high quality (i.e., reliable, consistent, well defined, etc.) because the result may be a study of the 1980's that will go far beyond what was possible for the 1970's.

CHAPTER 2

THE ART OF MEASURING THE ARTS

The objective of this study was to determine (where possible) the growth of nonprofit arts and cultural organizations in the seventies in order to answer the question, "What happened to the arts during the decade of the 1970s?" The question as stated lacked adequate specificity, so the first step was to define its elements. Taking the three elements of the question in reverse order, they can be defined as follows:

> During the decade of the 1970s: The decade can be defined either as 1970-1979 or as 1971-1980. This study uses both definitions; however, the first definition was used most frequently only because more data were available for that 10-year span.
>
> The arts: The scope of this study eliminated two large segments of the arts world: profit-making (commercial) organizations and individual artists. Thus, only nonprofit organizations were included.
>
> What happened: Two aspects of "what happened" were examined. One was to observe the change in the number and types of organizations that existed at the beginning of the decade versus the end of the decade, generally described as "counting the universe of arts organizations." This aspect was specifically to determine how many nonprofit organizations of varying types existed in 1970 versus in 1980.
>
> The second aspect of the "what happened" question is how the organizations themselves changed over the decade. Did they grow or shrink in size? Did they employ more or less artistic, technical, or administrative staff? Did they provide more or less or different services? Did their mix of income or expenses change? Did they operate at a surplus or deficit? Generally speaking, were organizations better off in 1980 than they were in 1970?

Furthermore, were the changes that occurred the same for all types of organizations, or only for certain types or sizes, or for those located in a particular area of the country?

As this chapter highlights and other sections of this report point out, the measurement of the economics and financial health of arts organizations during the decade of the seventies (and continuing now into the eighties) is not being conducted in a uniform manner by the data-collecting organizations. At this time, measurement is still very much an art, and furthermore, the "Art of Measuring the Arts" is still in its formative stage. This chapter discusses this "Art of Measuring the Arts" as it stands now; Chapter 4 presents a framework for analyzing the economic behavior of arts organizations. The results of our attempts to look at the first aspect of "what happened", i.e., to measure the size of the universe at the beginning and end of the decade (count the number of organizations and generate an economic measure of the universe) is covered in the next chapter. The second aspect of "what happened," measuring change in five groups of organizations themselves, is covered in Chapters 5 through 9.

The discussion of the state of the art of measuring the arts is split into two sections. One part covers attempts to count the universe of all arts organizations or particular groups of organizations; the other part covers data on a defined group of organizations. These two parts are reflections of the "what happened" question introduced in the first paragraphs of the chapter.

Counting the Universe of Arts Organizations

Four sets of data on arts organizations in the seventies look at a "universe" of organizations:

- o Internal Revenue Service: Statistics of Income on Organizations that are required to file IRS Form 990 (report from tax-exempt nongovernment organizations)
- o Census Bureau: Economic Census of Service Industries

- National Research Center of the Arts: The Status of Nonprofit Arts and Museum Institutions in the United States in 1976

- Ford Foundation: The Finances of the Performing Arts

The problems of each data set are described in detail in Chapter 3. The most significant common problem is that none of these fully counts the "universe" of arts organizations. Each defines the universe in a way that excludes a significant portion of organizations that are known to exist. Furthermore, as is noted repeatedly in this report, the "true universe" of arts organizations is nowhere defined, and its boundaries are subject to individual interpretation. Therefore, the first and most critical problem in measuring the arts is determining which universe or subpart is being measured.

Because no data set even approximates the true universe, one way to attempt to measure the universe of arts organizations is to use data that describe the universe of a particular discipline and to add all the disciplines together.

Serious problems arise from estimating the number of arts organizations on a discipline-by-discipline basis and then adding these together to measure the whole universe; i.e., adding the number of organizations of each discipline together to create a grand total. This methodology requires that each discipline be a mutually exclusive subpart of the universe. However, since there has been no systematic attempt to coordinate estimates of separate discipline universe sizes, the simple additive process is foiled because an individual organization may be either counted in two disciplines or missed altogether. The first aspect creates an overlap problem, and the extent to which this occurs can only be guessed at at this point. The following example will illuminate this problem.

One opera universe for which individual organization data were available was the National Opera Institute (NOI) Census. NOI collected information in 1977. They defined an opera company as a nonprofit organization that performed/produced at least one fully staged opera during each of the previous three years. The following were among the 115 organizations included under that definition: Aspen Music Festival, Brooklyn Academy of Music, Inc., Columbus Symphony, Duluth-Superior Symphony Association, Hartman Theater Company, Natural Heritage Trust/Artpark, San Antonio Symphony Orchestra, Spoleto Festival, USA, and Wolf Trap Foundation.

Although these organizations did produce fully staged operas, they are not what is generally considered to be opera companies. The inclusion of these organizations not only distorts the size of a "mutually exclusive opera company" universe in numbers of organizations, but also inflates the economic size of the universe. The dollar size of NOI's universe was $101 million. Of that total, over 10 percent ($11.8 million) represented organizations that were not primarily opera companies. Specifically, $7.4 million came from these three organizations, all of which are large presenters/producers of all types of performing arts: Aspen Music Festival, Natural Heritage Trust/Artpark, and Wolf Trap Foundation.

However, even with these problems, the data from this census can be used because each organization and its budget was reported separately. Therefore, the gross figures can be reduced to reflect the desired mutually exclusive discipline universe: "organizations whose primary function is as an opera company."

This overlap problem, therefore, is that the same organization can appear in two or more universes. The Kitchen Center for Video and Music (New York City) is a museum within the definitions of museums of the Institute of Museum Services and the American Association of Museums, and is counted within the museum universe. It is also a media arts center and a new arts space (two other visual arts categories), and has received grants from the National Endowment for the Arts in the programs of Music, Dance, Media, Museum, Opera/Musical Theater, Visual Arts, and Inter-Arts. Another institution, the Walker Arts Center (Minneapolis-St. Paul), is considered a performance facility and sponsor, a media arts center, and a museum. One further example is a symphony orchestra that produces operas and presents choral and chamber music performances under its auspices and, therefore, has data on the disciplines of opera, chamber, and choral music within its organizational information.

No single source of discipline data examined was without overlap problems. This should not be surprising, however, since service organizations that are the primary source for data are advocates for their disciplines and find it in their best interest to represent their discipline and potential membership as broadly as possible. But the resulting overlap problem creates the potential for double counting when attempting to describe the total universe of arts organizations from discipline data.

Counting numbers of organizations/artistic groups is a simple task in comparison with matching dollars to a discipline. The economic measurement problem is complicated by the fact that although one thinks of the arts by discipline (e.g., symphony, museums, folk arts), it is through formal organizations that dollars are measured, because that is how records are kept. And organizations do not always equate to disciplines.

Two further primary economic measurement problems arise from this organization entity versus discipline issue. First, there is the "parent" versus "subsidiary/affiliate" problem. Many arts organizations are not separate entities, but rather part of a larger, often non-arts institution such as a university. Another example is City Center for Drama and Music, Inc., the parent of the largest ballet in the country--the New York City Ballet--and of the second largest opera--the New York City Opera. The readily available financial records are presented by the total (parent) organization, making it difficult to segregate detailed fiscal activity for each subsidiary.

There is also the producer-sponsor problem. This problem arises from a distinction of function rather than discipline: the "producers" are the manufacturers of the artistic product or service; the "sponsors" or "presenters" are the distributors of that product. From an economic standpoint, this distinction is important to bear in mind when comparing the arts to other national industries. The sponsor/presenter segments of the arts community must be described separately from the universe because they are not the direct producers of the artistic product. Their artistic output is actually the art of the producing organizations they sponsor or present. Including the sponsor/presenters in the production universe results in double counting of performances, of audience size, and more important, of dollars. However, in measuring the size of the total universe of organizations involved in bringing the arts to the public (or otherwise promoting them), it is important to account for them.

An example of this second problem is the largest nonprofit resident theater in the country (New York Shakespeare Festival), which is more often a sponsor of other theater companies than a producer. If the New York Shakespeare Festival presents another theater company's production, that production and its economic activity could well be counted twice in data describing all theaters.

Most funding sources give grants to organizations along discipline lines and seek information along this dimension or related to particular products. But if the question to be answered is "What has happened?" or "Are the arts better off now than at some time in the past?", the actual question being asked is whether those organizations (and individual artists) are better off. One cannot measure the performance of an activity/discipline; one can only measure the performance of organizations that conduct activities within this discipline.

Countered against these problems of overlap and double counting is the potentially larger problem of undercounting organizations and economic activity. The methodology of building a universe from disciplines presumes that all disciplines have data. This is clearly not the case. Many artistic disciplines have little or no data on the number or size of organizations. In those disciplines where there are data, frequently the data describe only a certain sub-population (such as all organizations over $100,000 budget size or all members of a particular service organization or all participants of a conference). The parent-subsidiary problem described above also results in undercounting, since many subsidiary arts groups or organizations are never found.

Some Problems in Surveying Smaller Arts Organizations

The most common undercounting problem stems from the lack of data on small arts organizations. As is clear from reviewing the methodology and studying the data available on arts organizations, the larger, professional organizations are better represented. Small, amateur, avocational, and aspiring-to-professional organizations are poorly represented at best and usually not represented at all.

In part, this situation arises from pragmaticism. These organizations are very difficult to survey. First of all, they are difficult to find, for many are in operation for only a limited part of the year. Many have no physical location—the organization's official address is the director's or a board member's address. Without a paid staff member, filling out a survey form is left for after hours by an already overworked, artistically oriented individual. Furthermore, the financial records are often kept by another individual, either a paid or a volunteer bookkeeper, and are not readily accessible. Contacting small organizations by telephone (multiple times if a response is necessary) is also a frustrating task, as illustrated by an only 44 percent response rate that one study achieved after three telephone contact attempts per organization.

From an economic viewpoint alone, small organizations have a minimal impact. The number of organizations may be large, but their dollar impact is small—in many fields 60 to 70 percent of the organizations generate less than 10 percent of the dollars.

However, in many parts of the United States and in several disciplines, these small organizations ARE the arts. The output from these organizations is produced largely with in-kind contributions of materials and space and the volunteer services of individuals serving in artistic, technical, administrative, and fundraising capacities. When measured in dollars, the output from those organizations is undervalued, for there are no expended dollars from those contributions. Likewise, the compensation of artists (where it exists) is usually undervalued, for these organizations are the "employers" of the student, the apprentice, and the "struggling" artist.

Even in the largest and most affluent organizations, much economic activity occurs without the equivalent dollars changing hands. Local businesses will donate paint, printing, and so on; universities, local governments, and recreation departments will donate performance, exhibition, and studio space or provide it for a reduced fee. The gift of a work of art to a museum usually is not recorded on the books in dollar terms. However, all of these are examples of economic inputs that arts organizations receive to produce the output of performances, exhibitions, and works of art.

Since this seventies decade study relied on data that already existed, and since data on in-kind contributions and volunteer services rarely exist, it was not possible to measure the economic activity represented by these contributions.

In summary, therefore, three major problems inflate the data when adding discipline-based data together to create a universe count: the overlap problem, the parent/subsidiary/affiliate problem, and the producer-sponsor problem. Countered against this are the problems of missing organizations and dollars. Even with these measurement problems, the only way currently available to estimate the size of the true universe of arts organizations is by adding the estimates of mutually exclusive discipline universes together.

Classification of the Universe

To avoid the double counting and undercounting arising from the problems described earlier, a working model of a classification system had to be developed. Arts organizations are a diverse group. They produce and present art, they educate and provide services in a host of different art forms or disciplines. Because no list or count of the true universe exists, counting the total arts universe requires that a set of mutually exclusive categories be used.

One classification of the arts is by type of art (art form/discipline). The top half of Figure 2-1 shows a classification of art forms or disciplines. Another classification relevant to arts organizations is by function (what the organization

CLASSIFICATION OF THE ARTS BY DISCIPLINE AND FUNCTION

DISCIPLINE (Art Form)

Dance

- Ballet
- Ethnic/Folk
- Jazz
- Modern

Music

- Band (not including Jazz or Popular
- Chamber
- Contemporary (including Experimental, Electronic)
- Ethnic/Folk
- Jazz
- Popular (including Rock)
- Solo/Recital
- Symphonic
- Opera
- Choral

Theater

- Theater - General (including Contemporary, Experimental)
- Mime
- Musical Theater
- Puppet
- Theater for Young Audiences

Visual Arts

- Conceptual Art
- Environmental Art
- Graphics
- Inter-Media
- Painting
- Performance Art
- Sculpture
- Photography

Media Arts

- Film
- Radio
- Television
- Video (including Holography)
- Video (including Disks and Tape)

Other

- Crafts - General
- Folk Arts
- Literature
- Architechure/Design/Planning
- Other

* * *

FUNCTION

Production

- Live Performance
- Media Performance (on TV, Radio, etc.)
- Electronic Media Products (Film, Videotape, etc.)
- Other Artistic Products (Literary, Graphic, Photography, Craft)

Distribution/Dissemination

- Sponsorship/Presentation (of Performances, Exhibitions, etc.)
- Broadcasting
- Sales/Rental of Media or Other Artist Products

Training and Education

- Schools, Apprenticeships, Residencies, Special Performances, Exhibitions, etc., Workshops, Lectures, etc., for various purposes:
  - Professional/Artistic Personnel
  - Higher Education Level
  - Elementary and Secondary Education Level
  - General Public

Provision of Artistic/Technical/Resource Services

- Consultation/Technical Assistance
- Space/Equipment/Materials
- Funding/Financial Assistance
- Other Services

FIGURE 2-1

does), shown in the bottom half of Figure 2-1. Arts organizations can be uni-functional or multi-functional within a single art form or across many art forms. Thus, neither classification presents a set of mutually exclusive categories that appropriately defines organizations. Therefore, to count organizations in the universe. a classification of organization types had to be developed. Figure 2-2 presents this classification, which, on first glance, appears to be a hodge-podge mix of the discipline and function classifications. The first two columns tend to be discipline related, whereas the third column is composed of organizations according to function. These are indeed apples and oranges, for arts organizations have involved themselves in multiple functions and disciplinary activities to further enhance the creative process and to remain viable. However, this apples/oranges classification allows a mutually exclusive designation of an arts organization based on primary purpose/activity. Incidentally, this classification has not received rigorous testing, and if and when further universe study is undertaken, this classification will probably be adjusted.

In this study, the universe had to be constructed from disciplines. Wherever possible, the organization-type classification is used. As described earlier, data by art form/discipline creates overlap and inclusion of sponsor/presenters results in double counting. Where it was possible to discern overlap or double counting in the data, they have been removed from the figures. However, these problems are probably of smaller magnitude than the offsetting problem of undercounting due to organizations missed and/or buried under a parent organization.

In only a few disciplines are there data for both the beginning and the end of the decade. Thus, these are the only areas in which we can estimate growth in the universe. In some other disciplines, data were located for specific points in the decade (centering on 1977), providing a rough estimate of the universe at that time. However, in many disciplines no such data exist, and no estimates of the size or the growth of the universe can be made.

CLASSIFICATION OF ARTS ORGANIZATIONS BY PRIMARY PURPOSE/ACTIVITY

Performing Arts

- Symphony Orchestra
- Chamber Orchestra
- Opera Company
- Concert Opera Company
- Musical Theater Company
- Resident Theater Company
- Children's Theater Company
- Community Theater Company
- Other Theater Company
- Ballet Company
- Modern Dance Company
- Folk/Ethnic Dance Company
- Jazz Dance Company
- Other Dance Company
- Choral Group
- Chamber Ensemble (not Orchestra)
- Jazz Music Group
- Mime Group
- Multi- or Interdisciplinary Performing Group
- Other Performing Group

Visual Arts, Museums, And Literature

- Art Museum/Gallery
- Childrens/Junior Museum
- General Museum
- History Museum
- Science Museum
- Park Museum/Visitor Center
- Specialized Museum
- Other Museum
- Library/Archive
- New Arts/Alternative Space
- Craft Membership Organization
- Artists' Space or Collaborative
- Audio/Film/Video Producer
- Radio/TV Broadcaster
- Media Arts/Film Center
- Small Press
- Literary Magazine
- Review Journal
- Distributor of Literary Works
- Other Literary Organization
- Other Organization in Visual Arts

Sponsors and Education

- Performance Facility
- Exhibition Space (not Museum or New Arts/Alternative Space)
- Fair/Festival
- Art/Cultural Center
- Sponsor of Performing Arts (not Facility or Performing Group)
- Performing Arts School
- Visual Arts School
- Other School for the Arts
- Other Arts Education Organization
- Arts Departments of Higher Educational Institutions

NOTE: Art forms such as folk and design are not segregated into separate organizational types because they seem to fall equally under other organizational types such as artists collaborative or fair/festival. Arts service, funding, and advocacy organizations and arts agencies are not included because their primary purpose/activity is not production or presentation of the arts.

FIGURE 2-2

The State of Measuring Change in Arts Organizations

The second aspect of "what happened to the arts" was defined as a determination of change in the organizations themselves. To reiterate, growth of arts organizations can occur in two ways: an increase in the number of organizations (the universe measurement of what happened) and an increase in the size of individual organizations. To measure the simplest aspects of growth in arts organizations (increases in total expenditures or income, in numbers of employees, or in numbers of total populations served by these organizations), they need not be split into disciplines or organization types. However, to analyze the reasons behind the growth or to address questions about potential future growth (or lack of it), arts organizations must be grouped according to type. Museums and symphony orchestras have different characteristics and cannot be analyzed in detail when grouped together. Chapter 4 provides the framework for the economic analysis of arts organizations that is used in the last part of this study.

To be able to analyze arts organization economics requires details about the organization's finances (income and expenses) and about personnel, facilities, number and types of performances, exhibitions, services, etc. These details need to be available for a common group of organizations for a series of years to be able to measure change.

Thus, to measure behavior of each group of organizations (discipline) over the decade, ideally one would want to create a three-dimensional data base with the axes representing (1) years (1970-80), (2) universe of arts organizations stratified according to discipline (e.g., opera, museums) and further stratified by institutional characteristics such as budget size and geographic location, and (3) key arts variables (e.g., earned income, expenses). Figure 2-3 diagrams this ideal three-dimensional data base. Within each cell, the data would be accurate and defined uniformly and correctly. In a few disciplines, data of this detail and quality do exist for some or all of the years of the decade. High quality data of this sort are very limited, however. The task involved in building such a data base for the 70's from data readily available is far from ideal, and many problems exist in combining extant data sets.

IDEAL DATA BASE

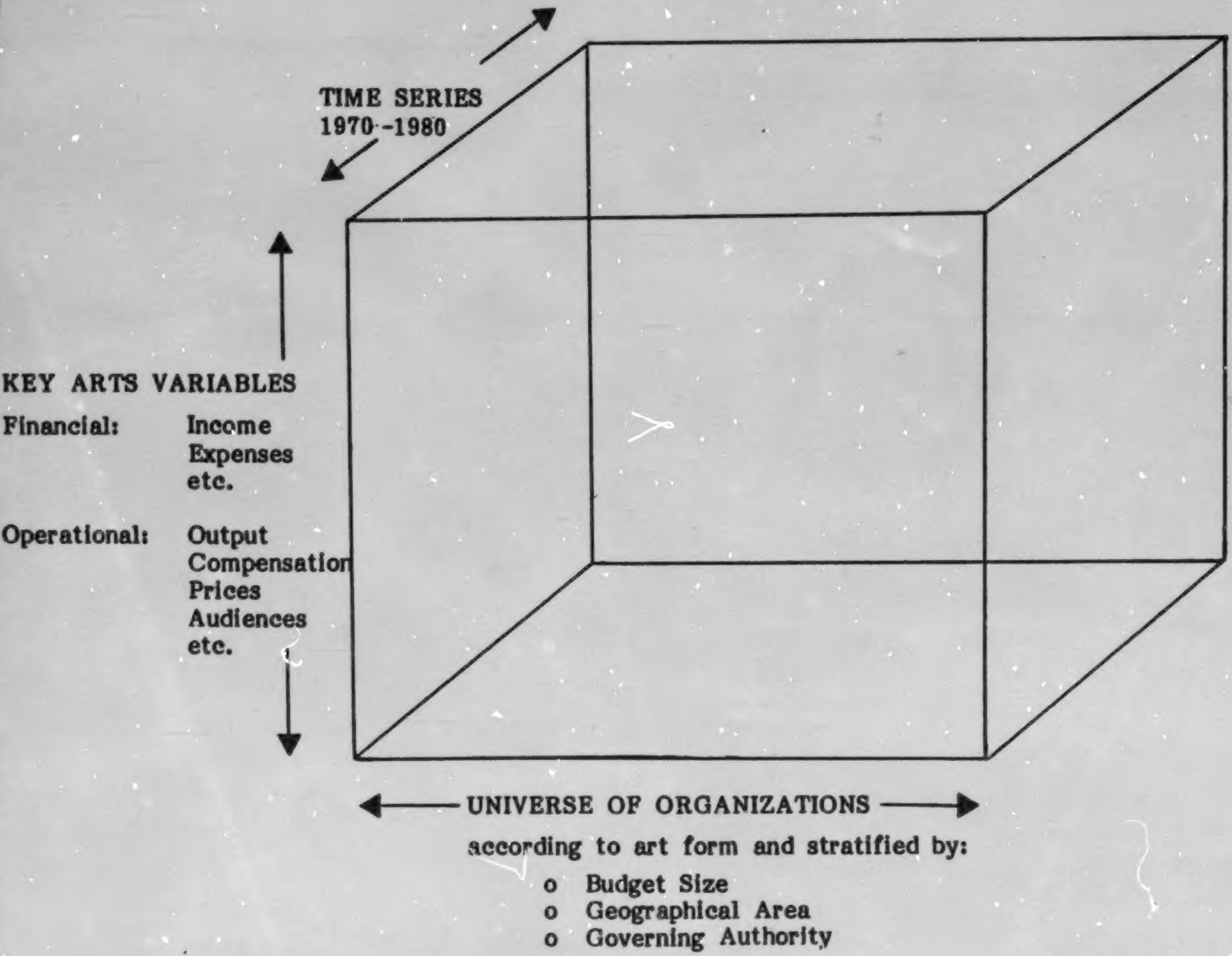

TIME SERIES
1970 -1980
KEY ARTS VARIABLES
Financial: Income
Expenses
etc.
Operational: Output
Compensatio
Prices
Audiences
etc.
UNIVERSE OF ORGANIZATIONS
according to art form and stratified by:
o Budget Size
o Geographical Area
o Governing Authority

FIGURE 2-3

For some disciplines, no data segregated by that discipline exist. In fact, for some art forms, there are no data whatsoever. The universe of organizations within any one discipline or organization type is not fully covered by any data set. Some disciplines are adequately covered; most are not. Stratification by important institutional characteristics within an art form is seldom defined. Only one discipline has consistent data for each year in the decade; some data sets cover only part of the decade, and many data sets cross art forms for one particular year or contain only one year's data. Furthermore, not all data sets ask for even the most important variables.

Process Used to Create a Uniform Data Base

To analyze economic behavior and growth, we needed to create, where possible, a uniform data base from disparate data sources. Our approach, therefore, consisted of several intermediate steps in attempting to patch together data.

We built a small, 10-year data base for a sample of arts organizations in each of five disciplines for which data had been collected for several years in the seventies. The five disciplines were Symphony Orchestra, Theater, Opera, Dance, and Museums. Each data base was edited to insure internal consistency (both from organization to organization and from year to year) and to correct any detected errors. Where possible, an attempt was made to verify the data with other sources. This helped to assess data reliability and the weaknesses of each data set. Where possible, we tried to detect and correct the following potential quality and data reliability problems:

- Poor or unclear definition on the survey instrument leading to incorrect or inconsistent completion by respondents

- Items that incompletely or inaccurately reflect the variables they purport to measure

- Biased or poorly designed samples

- Item nonresponse and organization nonresponse, resulting in too few organizations responding to permit the data in aggregate to be representative or in too few answers to specific items to be reliable

- Inaccuracies unknowingly created by respondents, either when recasting data to meet questionnaire needs or when a specific question required calculations

- Mistakes of transcription from organization records to instrument, from instrument to tabulation form (e.g., keying into electronic form or transcribing onto spread sheets), in the calculation process (if not done on the computer), or from results of calculations to final reports and tables (i.e., a typographical error).

Once we had a clean data base for a sample of organizations within a particular discipline for some but not all years of the decade, the next step was to hook two data bases together or to add on to one data base to provide a 10-year period.

Only one extant data base covered a large number of organizations in the discipline for 10 years. To build the other 10-year data bases, we integrated data for individual organizations from two different sources. In so doing, we found two problem areas that created difficulties in matching up the data:

(1) Variations in or lack of definition of data items (especially for what was to be included)

(2) Variations in the definition of the organization entity represented in the data.

The result was that the way certain items were reported for a particular organization might vary from one data source to another. This variance meant that identifying the part of the difference over the time span that was due to an economic change versus the part that was due to a change in definition was of crucial importance. This identification task was laborious, but not impossible. An incidental benefit of this process was that it revealed some important potential problem areas that could render misleading or meaningless any data collected in the future. A fuller discussion of particular problems and their resolution is covered in each chapter on the analyzed disciplines (Chapters 5 through 9) and in Appendix B.

With a uniform data base created, data were then keyed and edited, and a computer file was created for the sample in each discipline on which to tabulate, stratify, and analyze data. The final step preparatory to analysis was to impute data where missing, if possible. For many variables, not all organizations in our samples reported data. In cases where we had some basis for doing so, we interpolated or imputed missing data. (For a fuller discussion on imputation and estimation methods used in this study, see Appendix B.) In other cases, the organization with data missing was removed from the sample when the missing variable or corresponding variables were analyzed.

Deflating Data and Calculating Growth Rates

Once a computerized data base existed, detailed analysis was possible. The analysis performed on the five samples of organizaions in this study was as follows. Growth rates for the variables in the samples were calculated for relevant years. This was done on reported economic data and on data deflated by either the implicit price deflator for the GNP or the Consumer Price Index, each adjusted to a July to June fiscal year and reset where appropriate to 1970 = 1.00. (A third deflator, the Consumer Price Index excluding food, was tried, but the results were insignificantly different from the normal CPI.) To calculate growth rates, least-squares estimation under the assumption of exponential growth was used.1/ (See Appendix C for details.) With the calculation of growth rates, we were able to analyze the growth of these samples over the decade of the seventies.

1/ See Ford Foundation. The Finances of the Performing Arts. p. 92, on the nature of and the reason for this assumption.

The decade of the seventies, especially the last years, was a period of rampant inflation. This is an important factor to keep in mind when reading this report and assessing the rates of growth of organizations. The value of the dollar was cut in half during this period, as Figure 2-4 shows. Thus, to stay even over the decade, and organization had to double its budget size. A growth rate of about 6.8 percent translates into zero real growth over the decade. In reading the analyses in Chapters 5 through 9, it should be remembered that any growth rate less than about 7 percent reflects no growth. Thus, the tables and many of the graphs are presented in both actual dollars and in real (constant) dollars.

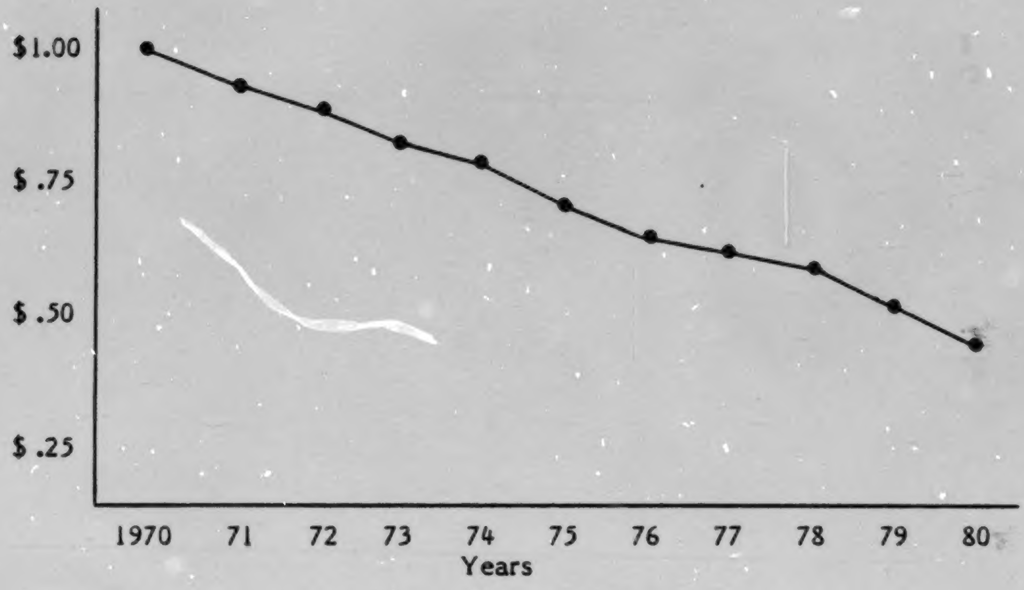
The Samples and The Universe

The final step in measuring the arts would be to blow up the analysis of the sample in a discipline in order to estimate change among the universe of that discipline. From the growth rates of the samples, an estimate of the growth rates for a wider universe of organizations would be made and then applied to absolute universe figures in order to obtain the absolute change over the decade. To make this application, a thorough understanding of the connection between the sample and the universe is required.

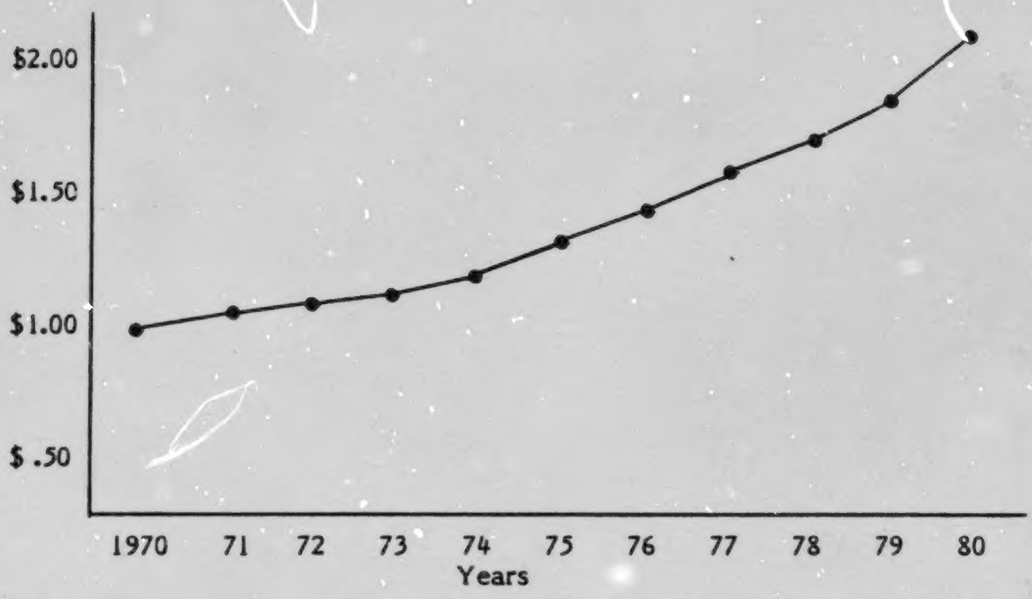
The crucial question is, What is the universe? "The universe is all the people or firms or material, conditions, concentrations, models, levels, etc., that one wishes to learn about, whether accessible or not."[2/] However, there are no universally accepted definitions of the universes of the different artistic disciplines. In fact, even the same person or organization has changed its definition of the universe over time. For example, what is contained in the orchestra universe? Only professional orchestras? How does one define professional?

[2/] Deming, W. Edwards. Sample Design in Business Research. J. Wiley & Sons, 1960. p. 8.

VALUE OF THE DOLLAR DURING THE 70's
According to the Consumer Price Index
Adjusted to a July 1st through June 30th Year



What a dollar was worth in succeeding years.



Consumer Price Index (fiscal year basis): How much it took to buy $1.00 worth in succeeding years.

FIGURE 2-4

The same question applies to other arts disciplines. For example, in the early seventies, did the museum universe consist of the 1,821 institutions decided on by a panel of experts in Museums USA[3] or all of the approximately 5,000 listed in the 1979 Official Museum Directory of the American Association of Museums?[4]

Furthermore, we usually have information at any given time only on a particular sample or frame, not on the entire universe. "The frame is a set of physical materials (census statistics, maps, lists, directories, records) that enables us to take hold of the universe piece by piece."[5] The list of 1,821 museums in Museums USA is an example of a frame. The investigators of that report used the 1,821 museums for the purpose of their survey through the use of six criteria, while recognizing that there are many more institutions called museums that do not meet those standards. (See Appendix A.)

Of course, the greater the gap between the frame and the universe, the less reliable are the estimates. "The application of the results of a complete count or of a survey that covers a given frame or set of frames must be carried by judgment to the remainder of the universe. There is no statistical theory that will objectively bridge this gap."[6] The judgment necessary to bridge this gap comes from the knowledge of experts in the arts field and from discussion with them.

Thus far, the ideal procedure for extrapolating data from a sample to the universe has been described. This goal can be approached most closely for the orchestra universe, where an abundance of data exists. For the other major art forms of opera, dance, theater, and museums, the samples used were too small to estimate the growth of the discipline universes.

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[3] National Endowment for the Arts. Museums USA: A Survey Report, 1975.

[4] American Association of Museums. The Official Museum Directory, 1978-79, 1978.

[5] Deming, op. cit. p. 9.

[6] Deming, op. cit. p. 41.

For other artistic disciplines, no growth rate or time series data exist. Furthermore, in most disciplines, only a guess about the size of the universe can be made, because there are only sporadic data for a year or years for a subset of organizations. Therefore, we present these bits and pieces, lay them out, and try to patch together a picture of the universe.

Current practices of measuring the arts vary from relatively sophisticated measurement to no measurement at all. Thus, for some types of organizations (e.g., orchestras), the economic analysis can be relatively detailed, whereas for other types of organizations, no analysis can be made.

CHAPTER 3

THE UNIVERSE OF ARTS AND CULTURAL ORGANIZATIONS

One of the important tasks in addressing the question, "What happened to nonprofit arts organizations during the decade of the 70s" is the determination of how many arts organizations there were during the decade, i.e., how many at the beginning and how many at the end, and also of their demographics: types, budget size, geographical location, and so on. These are fundamental aspects of the definition of a universe. As is pointed out in Chapter 2, no clear definition or listing of a universe of arts organizations exists. However, to be able to assess the validity of the data representing various groups of organizations, some estimate of the universe must be made. Therefore, a necessary task of this project was to construct such a universe from disparate data sources.

This chapter presents the construction of the universe of nonprofit arts organizations in terms of number of organizations and total economic size (as measured by size of operating budget). Outlined in Chapter 2 were the primary definitional problems encountered in trying to discern the true universe from existing data sources. Most data sources used for the universe construction reflected a single artistic discipline. But, although laden with overlap, undercounting, and other hidden problems, the only way to currently construct a universe is by adding together figures from the discipline-oriented data sources.

Four multi-disciplinary organization-based data sets were found. These are assessed in detail below. Two are routine data collections of the federal government; the other two are results of specially commissioned studies. The limitations of all four are substantial enough to render any one of these multi-disciplinary data sets useless as a starting point. However, in some disciplines, it was necessary to make considerable use of three of the data sets.

Following the discussion of the four multi-disciplinary data sets is a discipline by discipline construction of the universe of arts and cultural organizations. This universe is measured in numbers of organizations and total dollar volume of expenses.

This latter measurement gives a sense of the economic size of the universe. Very limited data on organizations at the beginning of the decade were found, but for most artistic disciplines, some data collected in the period 1977 through 1979 could be used to construct a universe for that general period of time. Where more than one data source and/or one point in time were available, the data were juxtaposed and analyzed accordingly. Although rigorously derived numbers clearly would be desirable, the need for an estimate of the universe, however rough that estimate might be, warranted using simplistic techniques on whatever information was available.

MULTI-DISCIPLINARY, ORGANIZATION-BASED DATA SETS

Among the data on arts organizations investigated and analyzed were three universe data sets (and one partial universe data set) that are organization-based and cover multiple disciplines rather than single disciplines. The two federal government data sets are the Statistics of Income (SOI) of the Internal Revenue Services and the Economic Censuses of the U.S. Bureau of the Census. The others are the data set collected in mid-decade by the National Research Center of the Arts (Louis Harris and Associates, Inc.) and the Ford Foundation data base on the performing arts (covering 1966 through 1974). Because these data sets are organization based rather than discipline based, theoretically they could provide data that are not beset with problems described in Chapter 2. However, problems exist with each of these universes. Each data set and its limitations is described below, thus explaining why, for disciplines for which there are other data, we have chosen to build the universe from other data sources.

Internal Revenue Service: Statistics of Income (SOI)

The Internal Revenue Service is the federal agency that grants tax exemptions to nonprofit organizations. The Form 990 is an annual submission required of tax-exempt organizations to be filed as evidence and continuing documentation of their tax-exempt status. Prior to the Tax Reform Act of 1969, essentially only social welfare organizations, labor unions, and trade associations were required to file, and very little of their Form 990 data were accessible to the public. The Tax Reform Act of 1969 changed the regulations to require filing by all tax-exempt organizations with the exception of church-related organizations, organizations with gross receipts of less than $10,000, public (government) agencies, and affiliates covered under the exemption of a parent organization that is required to file.

Until 1979, Form 990 was constructed in such a manner that only a few items were relevant for measuring economic change in the arts. (The 1979 form provides much better and more extensive data. The form was further revised in 1981 to provide better definition and to eliminate some problem areas. However, for universe measurement alone (i.e., counting organizations and determining budget sizes), the old Form 990 would theoretically be adequate.

The Internal Revenue Service has generated some statistics on Form 990 organizations covering the 1975 through 1978 return years. However, these statistics suffer from two problems to such an extent that they could not be used for this study. One problem is structural in nature--how the IRS classifies organizations according to type. The other problem is how the statistics were reported.

As of 1980, approximately 300,000 organizations (excluding private foundations) had been given tax-exempt status under Section 501(c) of the tax code. When an organizaton is granted such status, the IRS adds it to its Exempt Organizaton Master File (EOMF), classifying it into one of the following categories according to the purpose for which the tax exemption was granted:

- Religious Activities
- Schools, Colleges, and Related Activities
- Cultural, Historical, or Other Educational Activities
- Other Instruction and Training Activities
- Scientific Research Activities
- Business and Professional Organizations
- Family and Related Activities
- Mutual Organizations
- Employee or Membership Benefit Organizations
- Sports, Athletic, Recreational, and Social Activities
- Youth Activities

- Conservation, Environmental, and Beautification Activities
- Housing Activities
- Inner City or Community Activities
- Civil Rights Activities
- Litigation and Legal Aid Activities
- Legislative and Political Activities
- Advocacy
- Other Activities Directed Toward Individuals
- Activities Directed Toward Other Organizatons
- Other Purposes and Activities

Under each of these categories are groups that define either a type of organization or a principal function or activity of an organization. Each group is assigned a three-digit Activity Code. Prior to 1980, it was left to the individual organization to assign itself one or more activity codes. This has since been changed owing to the discovery of conflicting activity codes from year to year. The activity codes are now assigned by the IRS, based on all available information at the time of receipt of the Form 990. (This process includes a comparison to the previous year's assignment.)

The codes that can be used to identify arts and cultural organizations are found under the category headings "Cultural, Historical or Other Educational Activities" and "Other Instruction and Training Activities." The relevant codes from these categories include the following:

060 - Museum, zoo, planetarium, etc.
062 - Historical site, records of re-enactment
063 - Monument
064 - Commemorative event (centennial, festival, pageant, etc.)
065 - Fair
088 - Community theatrical group
089 - Singing society or group
090 - Cultural performances
091 - Art exhibit
092 - Literary activities
119 - Other cultural or historical activites

120 - Publishing activities
121 - Radio or television broadcasting
122 - Producing firms

These codes should represent categories of arts organizations that are freestanding and whose principal function is described by the code category heading. IRS reports that there are a total of approximately 58,000 organizations on the EOMF classified under these codes. Over half are designated "private foundations." Although this designation is based solely on a test of sources of income (that is, are the sources diverse or do they represent only one or two individuals or organizations?), not on stated purpose of the organization, most of the private foundations are foundations as one might generally conceive them. In 1974 (the only year for which exist detailed data concerning private foundations), there were 193 organizations classified as operating foundations, 84 of which were actually museums.[1/] These figures represent the bulk of what would normally be considered arts and cultural organizations rather than foundations out of the total "private foundation" figure.

Of the organizations not designated private foundations (i.e., public charities), approximately 26,000 fall within the categories listed above. The IRS staff have stated that it is possible for an organizations to be classified under more than one Activity Code, resulting in duplicate counts of organizations. Also, examination of the list of 26,000 showed many examples of organizations that are not arts organizations. One example is several units of the Junior League (a voluntary women's membership organization involved with all types of nonprofit services, the arts being only one).

In addition to the inclusion of duplicate and inappropriate organizations, there is the exclusion of many nonprofit organizations that are part of our desired arts universe. These are organizations whose primary purpose is clearly not artistic or cultural, yet have an arts group component. Such organizations include educational/academic institutions, recreational organizations, religious or other charitable organizations, community centers, Indian tribes, and even health and

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[1/] Internal Revenue Service, Statistics of Income: 1974-1978 - Private Foundations. Washington, D.C. 1981.

correctional facilities. These fit into other Activity Codes and file Form 990 under other major category headings. Therefore, their Form 990 data cannot be included in a description [illegible] arts/cultural activity.

Another major group of arts organizations for whih Form [illegible] data are available are those that are government affiliated. A significant group (in economic terms) consequently excluded are state and municipal museums.

As a result of these omissions, the absolute number of 26,000 arts and cultural organizations on the file cannot be used to measure the arts world or some defined part of it. However, by observing change over time of a subgroup, even though the relationship of the subgroup to the whole is unclear, theoretically one can infer change over time. This can be done if--and only if--the subgroup is defined in the same way each time data are collected over the period of time.

The Statistics of Income (SOI) produced by the IRS for 1975-1978 return years vary widely in the total number of organizations reporting. They do not show the total numbers of organizations in the arts and cultural categories (categories 60-119; category 61, libraries, is included). The number of organizations reporting for each financial data item are listed and vary from zero to several thousand. The only statistic that can be generated in such circumstances is an average for the whole group. However, since the composition of the IRS groups from year to year is problemmatic, even an average becomes a meaningless figure.

U.S. Bureau of the Census: Economic Censuses

One of the most concise descriptions of the Economic Census[2/] comes from introductory material published by the Census Bureau:

> The Economic Censuses are comprehensive and periodic canvasses of the Nation's industrial and business activities. Taken by the Census Bureau, a part of the U.S. Department of Commerce, the censuses provide a detailed statistical profile of a large segment of the national economy.

[2/] For a further analysis of the 1977 Economic Census, see the National Endowment for the Arts, Research Division. The Economic Censuses: A Report on Their Usefulness in Describing the Economic Activity of Arts Organizations, by Mary G. Peters, 1981.

> The Censuses were taken at varying intervals until 1954, when an integrated economic census program was begun. . . . Beginning with the 1967 censuses, Congress authorized the economic censuses to be taken at five year intervals, covering years ending in "2" and "7."
>
> The economic censuses are the primary source of facts about the structure and functioning of the economy and, therefore, provide information essential for both government and business. The censuses furnish an important part of the framework for such composite measures as the national accounts. In forecasting and planning, they are especially useful in analyzing the national product in terms of the transactions that determine its size and composition. The economic censuses also provide weights and benchmarks for indexes of industrial production, productivity, and price, all of which are essential for understanding current economic developments.
>
> Manufacturers and distributors make widespread use of the economic censuses in establishing measures of their potential markets by areas, kinds of businesses and kinds of products. Management in various industries and trades get facts from them for use in economic or sales forecasting performance, laying out sales territories, allocating advertising budgets and locating plans, warehouses and stores. Trade organizations use census statistics for insight into changes in the structure of industry. State and local governments use the geographic detail that describes the patterns of economic change in individual communities.[3]

The Economic Censuses are based on a classification of industries (and "establishments," separate organizational entities within industries) known as the Standard Industrial Classification (SIC) and are listed in the SIC Manual.[4] There are ten major divisions or groups within this code, as shown in Figure 3-1. These ten divisions cover all types of businesses and organizations. Each organization or establishment is or can be assigned a four-digit code within one of these ten divisions. The code assigned is based upon the primary activity of that organization.

The Census Bureau surveys establishments in seven of the ten divisions as noted in Figure 3-1. Arts organizations fall within six of the divisions, also marked on

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[3] U.S. Census Bureau. Introduction. 1977 Census of Manufacturers, Industry Series for Newspapers, Periodicals and Miscellaneous Publishing (MC77-1-27 A).

[4] The SIC Manual and maintenance of the SIC are the responsibility of the Office of Federal Statistical Policy and Standards in the Department of Commerce.

The Economic Census and Arts Organizations by SIC Division

Ten Major Divisions Of the SIC	Economic Census by Census Bureau	Arts Organizations Within SIC Division
Agriculture, Forestry, Fishing, Hunting and Trapping	No	
Mining	Yes	
Construction	Yes	
Manufacturing	Yes	X
Transportation and Utilities	Yes (Transportation) No (Utilities)	X
Wholesale Trade	Yes	
Retail Trade	Yes	X
Finance, Insurance and Real Estate	No	X
Services	Most - Yes	X
Public Administration	No	X

FIGURE 3-1

Figure 3-1. This figure shows that two types of arts organizations, those that are listed as trusts or foundations and all those that are government owned or affiliated, are not surveyed.

Another large number of arts organizations are not included because of the method used by the Census Bureau to construct the universe. An organization can be assigned to a particular SIC code by any data collection agency. (This code is not assigned to an organization in the way that an employer identification number (EIN) or a social scurity number is.) The Census Bureau builds its universe of organizations from the IRS (from annual reports of profit-making concerns and from annual reports of tax-exempt organizations--Forms 990 and 990PF and from the Social Security Administration, Form 941--withholding for FICA). On both of these forms, a blank space is provided to designate what business or primary activity is performed by the Organization (analogous to the "occupation box" on the IRS 1040 Form--personal income tax). Employees of IRS and SSA make the actual activity assignment, based on the self-description. If the description is unfamiliar or misleading to the IRS/SSA employee, the assignment can be incorrect. The Activity Codes used in IRS files as described in the previous section and not the SIC codes and, therefore, the transformation into SIC codes from IRS Activity Codes creates further potential misclassification. In fact, the Census Bureau has found that the SIC assignment sometimes is faulty and does correct it. During the processing of the Economic Census, this mistake is sometimes found and, if so, corrected in the Census Bureau's records.

Since an organization is assigned to a particular code according to its primary activity, some arts organizations are never identified (and, furthermore, technically do not exist as a separate establishment).5/ This is the same problem as with IRS Form 990 data, and are exemplified by arts groups in educational institutions. The economic activity of university museums is counted under the education industry unless the museum is located away from the campus and has separable records.

5/ An establishment, as defined both by the Census Bureau and in the SIC Manual, is an "economic unit, generally at a single physical location where business is conducted or where services . . . are performed". (Manual, p. 10) If reports can be prepared on the number of employees, their wages and salaries, sales or receipts, and other establishment data, then different activities should be treated as separate establishments. In practice, however, this separation seldom occurs in the arts, educational, or other nonprofit service organizations.

Another misclassification occurs because some arts organizations are organized under overseeing foundations. These may be coded under SIC 6732 (Educational, Religious, and Charitable Trusts), even though the narrative under this SIC group number says; "Trusts and funds which are predominantly operating establishments are classified according to the kind of business operated." This problem occurs in dance because the legal name of many dance companies contains the word "foundation."

A third and related problem is that some arts organizations, notably literary magazines and small presses, are not in reality legal, separate organizations, but informal subsidiaries of a nonprofit sponsoring organization. Consequently, they will not be picked up by the census.

A fourth problem that occurred in both the 1972 and the 1977 U.S. Census arose from organizations legitimately avoiding both the current IRS and SSA files. Nonprofit organizations have gross receipts under $10,000 do not have to file annual reports with the IRS. Although to receive tax exempt status an organization must make application to the IRS, the Census Bureau did not use the master (EOMF) extract tape from IRS which includes out-of-business organizations, but rather a list of the current filers of Form 990s.

Nonprofit organizations can elect not to withhold FICA taxes from their employees and consequently would not turn up in the SSA's "941 file."

As Netzer noted in his review of the 1972 Census,[6] the universe of performing arts organizations was significantly undercounted in 1972 because the Census Bureau used only the SSA 941 files. The Census Bureau recognized this problem, and in 1977, received both the 941 file (those employers who do pay FICA) and the 941E file (those who are exempt), thus immensely improving coverage of organizations within the Economic Census.

One final problem with the Census universe, especially in the case of museums and performance facilities, is that the Economic Censuses do not cover governmental units. Therefore, all municipal, state, and federal museums and performance facilities are missed.

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[6] Netzer, Richard. Feasibility Study for an Economic Data Program on the Condition of Arts and Cultural Organizations. New York University, 1977.

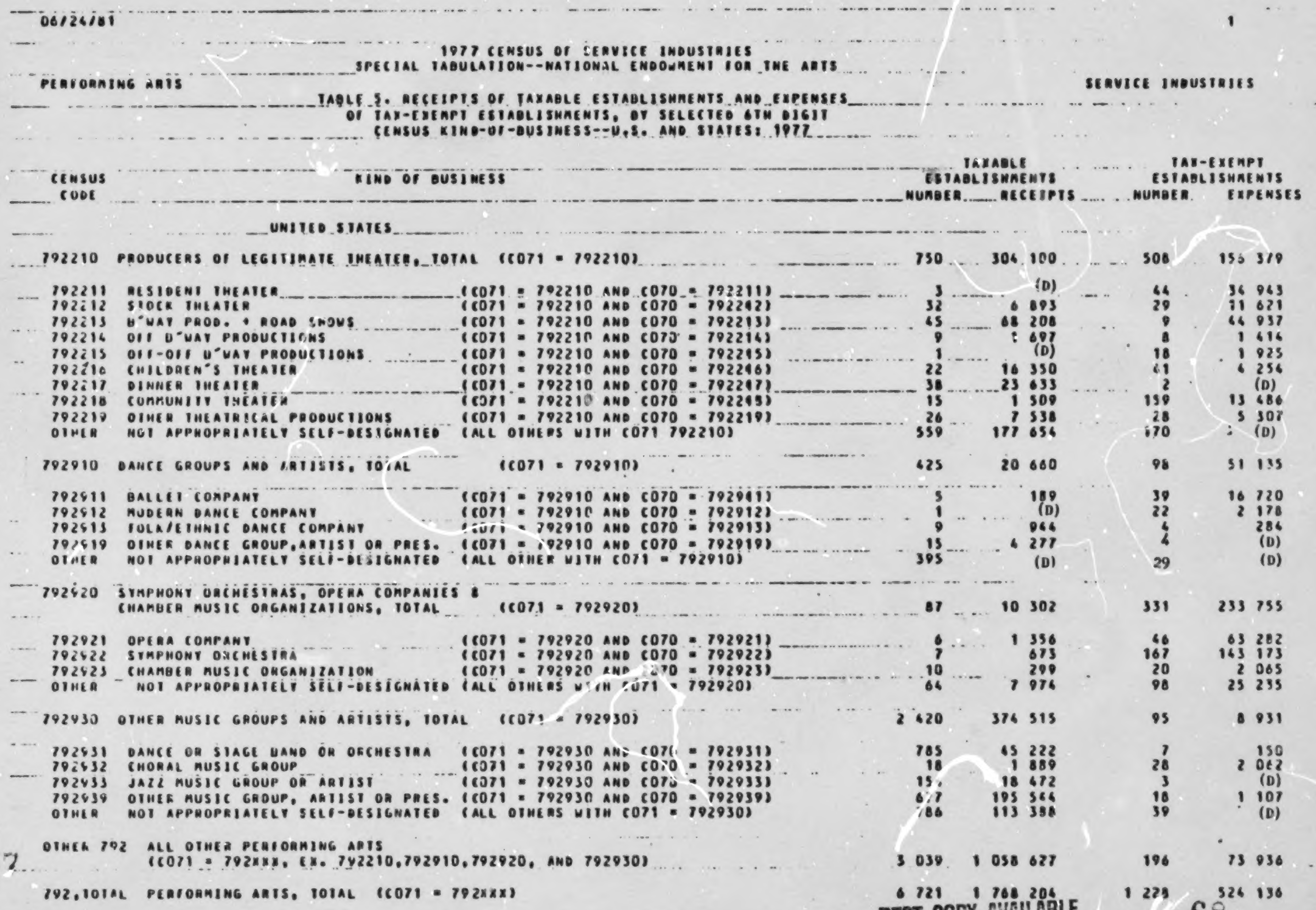
The preceding discussion explains in part why data collected by the Census Bureau under the Census of Service Organizations also do not accurately reflect the arts world. The overlap problem does not occur, but the parent/subsidiary problem is not resolved and the lack of a measurement of the government affiliated arts world creates a new one. In fact, a comparison of the census data with other data showed an undercount by the Census in each of the disciplines where comparison was available, i.e., the piecing together of a discipline universe provided more organizations and/or greater dollars. As the data on each discipline are presented, the figures specially produced by the Census Bureau for the National Endowment for the Arts are included. Special tabulations on the performing arts and for museums were generated.

In addition to the undercount, another problem with data generated by the Census Bureau arises from the Bureau's strict confidentiality provisions, which do not permit disclosure of data when only a few organizations are represented. Therefore, scattered throughout the tabulations are a frustratingly high number of "Ds" (not disclosed). An additional problem is that the Census Bureau changed its number/classification scheme within the SIC code structure. The Census Bureau appends two additional digits, and these digits were changed between 1972 and 1977 to improve the classification. For instance, Ballet was with Symphony and Opera in 1972 and with Modern and Ethnic/Folk dance in 1977. This change causes a problem in that a significant proportion of organizations are classified as NAS-D (Not Appropriately Self-Designated) in both Censuses (over 50 percent in some categories in 1972 and about 30 percent in 1977). The problem arises with not knowing where these misclassifications are. One table of the 1977 Census data produced for the National Endowment for the Arts is shown as Figure 3-2.

NRCA Study: The Status of Nonprofit Arts and Museum Institutions in the United States in 1976

In 1976-1977, the National Research Center of the Arts (NRCA) conducted a survey of the arts universe.

> While it (the study) may represent an advance in some way, this study should not be considered totally inclusive. Chief among its limitations, perhaps, is the fact that the "universe" or organizations from which the sample was drawn was subjected to screening criteria that insured certain threshhold characteristics. . . . The criteria were set up by



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1977 CENSUS OF SERVICE INDUSTRIES
SPECIAL TABULATION--NATIONAL ENDOWMENT FOR THE ARTS

PERFORMING ARTS SERVICE INDUSTRIES

TABLE 5. RECEIPTS OF TAXABLE ESTABLISHMENTS AND EXPENSES
OF TAX-EXEMPT ESTABLISHMENTS, BY SELECTED 6TH DIGIT
CENSUS KIND-OF-BUSINESS--U.S. AND STATES: 1977

CENSUS CODE	KIND OF BUSINESS		TAXABLE ESTABLISHMENTS NUMBER	TAXABLE ESTABLISHMENTS RECEIPTS	TAX-EXEMPT ESTABLISHMENTS NUMBER	TAX-EXEMPT ESTABLISHMENTS EXPENSES
	UNITED STATES					
792210	PRODUCERS OF LEGITIMATE THEATER, TOTAL	(C071 = 792210)	750	304 100	508	155 379
792211	RESIDENT THEATER	(C071 = 792210 AND C070 = 792211)	3	(D)	44	34 943
792212	STOCK THEATER	(C071 = 792210 AND C070 = 792242)	32	6 893	29	11 621
792213	B'WAY PROD. + ROAD SHOWS	(C071 = 792210 AND C070 = 792213)	45	68 208	9	44 937
792214	OFF B'WAY PRODUCTIONS	(C071 = 792210 AND C070 = 792214)	9	1 697	8	1 416
792215	OFF-OFF B'WAY PRODUCTIONS	(C071 = 792210 AND C070 = 792215)	1	(D)	18	1 925
792216	CHILDREN'S THEATER	(C071 = 792210 AND C070 = 792246)	22	16 350	41	4 254
792217	DINNER THEATER	(C071 = 792210 AND C070 = 792247)	38	23 633	2	(D)
792218	COMMUNITY THEATER	(C071 = 792210 AND C070 = 792245)	15	1 509	159	13 486
792219	OTHER THEATRICAL PRODUCTIONS	(C071 = 792210 AND C070 = 792219)	26	7 538	28	5 307
OTHER	NOT APPROPRIATELY SELF-DESIGNATED	(ALL OTHERS WITH C071 792210)	559	177 654	170	(D)
792910	DANCE GROUPS AND ARTISTS, TOTAL	(C071 = 792910)	425	20 660	98	51 135
792911	BALLET COMPANY	(C071 = 792910 AND C070 = 792941)	5	189	39	16 720
792912	MODERN DANCE COMPANY	(C071 = 792910 AND C070 = 792912)	1	(D)	22	2 178
792913	FOLK/ETHNIC DANCE COMPANY	(C071 = 792910 AND C070 = 792913)	9	944	4	284
792919	OTHER DANCE GROUP,ARTIST OR PRES.	(C071 = 792910 AND C070 = 792919)	15	4 277	4	(D)
OTHER	NOT APPROPRIATELY SELF-DESIGNATED	(ALL OTHER WITH C071 = 792910)	395	(D)	29	(D)
792920	SYMPHONY ORCHESTRAS, OPERA COMPANIES & CHAMBER MUSIC ORGANIZATIONS, TOTAL	(C071 = 792920)	87	10 302	331	233 755
792921	OPERA COMPANY	(C071 = 792920 AND C070 = 792921)	6	1 356	46	63 282
792922	SYMPHONY ORCHESTRA	(C071 = 792920 AND C070 = 792922)	7	673	167	143 173
792923	CHAMBER MUSIC ORGANIZATION	(C071 = 792920 AND C070 = 792923)	10	299	20	2 065
OTHER	NOT APPROPRIATELY SELF-DESIGNATED	(ALL OTHERS WITH C071 = 792920)	64	7 974	98	25 235
792930	OTHER MUSIC GROUPS AND ARTISTS, TOTAL	(C071 = 792930)	2 420	374 515	95	8 931
792931	DANCE OR STAGE BAND OR ORCHESTRA	(C071 = 792930 AND C070 = 792931)	785	45 222	7	150
792932	CHORAL MUSIC GROUP	(C071 = 792930 AND C070 = 792932)	18	1 889	28	2 062
792933	JAZZ MUSIC GROUP OR ARTIST	(C071 = 792930 AND C070 = 792933)	15[illegible]	18 472	3	(D)
792939	OTHER MUSIC GROUP, ARTIST OR PRES.	(C071 = 792930 AND C070 = 792939)	677	195 564	18	1 107
OTHER	NOT APPROPRIATELY SELF-DESIGNATED	(ALL OTHERS WITH C071 = 792930)	786	113 388	39	(D)
OTHER 792	ALL OTHER PERFORMING ARTS	(C071 = 792XXX, EX. 792210,792910,792920, AND 792930)	3 039	1 058 627	196	73 936
792,TOTAL	PERFORMING ARTS, TOTAL	(C071 = 792XXX)	6 721	1 768 204	1 229	524 136

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FIGURE 3-2

> experts in the cultural field . . . to insure both comparability of the data and the professional standing of organizations. A byproduct of this screening process, however, was the exclusion from the universe of a number of small organizations (generally those with annual operating budgets of less than $50,000) and some affiliated organizations.[7]

The criteria used were generally nonprofit status; separable functions, budget, and financial records; paid personnel; and minimum budget size and/or months in operation, and are shown in Appendix A.

NRCA generated a universe by combining lists of organizations from each of 50 state arts councils, the National Endowment for the Arts, and 28 national arts service organizations. These lists produced an initial universe list of almost 30,000 organizations, three times what was expected. The descision was made to screen organizations on a one-in-three basis. Over 4,000 organizations (approximately 13 percent) were actually contacted during the screening process, and of these organizations, only 40 percent met the NRCA criteria.

Interviews were conducted to collect data at 1,185 organizations, which NRCA then projected through its statistical weighting to a universe of 5,340 organizations, the distribution of which is shown in Figure 3-3.

In its own introduction, the NRCA study admits its limitations to those organizations with "professional standing," because of the screening criteria. In addition, given the questionable nature of the universe from which the sample was drawn arising from the problems incurred during the screening process (only 13 percent of the potential universe was contacted), the NRCA figures are also somewhat questionnable. However, as with the 1977 census data, it does represent another count of the universe from an organization point of view. Thus, this data source is also included in our universe discussion.

Ford Foundation: The Finances of the Performing Arts

In 1971, the Ford Foundation began collecting data from performing arts companies and groups in theater, opera, symphony, and dance. This survey was the

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[7] National Research Center of the Arts. The Status of Nonprofit Arts and Museum Institutions in the United States in 1976. 1978. p. 5.

Institutions in the Arts and Museum Universe - 1976
As Developed
National Research Center of the Arts (Louis Harris and Associates)

	Percentage of Institutions	Number of Institutions
Total Institutions	100	5,340
Total performing Arts	48	2,568
Theater	19	1,029
Opera	4	200
Symphony	10	495
Other Music	7	392
Dance	5	290
Presenter	3	162
Total Museums	28	1,470
Art	6	331
History	15	780
Natural History, Science, Planetaria	2	122
Zoos, Aquaria, Botanical Gardens	2	84
Other Museums	3	153
Art Centers	7	371
Visual Arts	8	430
Arts Councils, Service Organizations	9	501

FIGURE 3-3

first such survey on performing arts organizations in which "the expenditures and income data were so extensive, so uniform, and so precisely defined. In that sense, this study (was) the first comprehensive one of nonprofit performing arts organizations in the United States."[8]

> The sample was intended to cover as comprehensively as possible the nonprofit resident repertory theaters, operas, symphonies, ballets, and modern dance groups of the United States that operate on a fully professional basis (ordinarily with union contracts) with annual operating budgets of approximately $100,000 or more.[9]

Identified were 195 organizations that met these criteria, and 166 successfully supplied data for (most of) the years between 1966 and 1971. In 1974, the Ford Foundation repeated its survey, updating most of the organizations' data and adding a small number of organizations that had attained the professional status required by the criteria for inclusion. The distribution of organizations in the first round of data collection and presented in the published data and report was as follows:

Theaters	27
Operas	31
Symphonies	91
Ballet Companies	9
Modern Dance Companies	8
TOTAL	166

This sample of 166 reported total operating expenditures of $157.4 million in 1971. The report did give an estimate of a total expenditure figure for all professional nonprofit performing arts organizations with budgets of $100,000 or more at $170 million, for approximately 200 organizations.[10] For a detailed presentation of the data and cross-disciplinary analysis for the years 1966 through 1971, see The Finances of the Performing Arts. Using the unpublished data from 1970 through 1974 for a slightly different set of organizations supplemented by data from service organizations or financial statements, we constructed the growth rate data bases for opera, theater, and dance, analyzed here in Chapters 6 through 8.

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[8] Ford Foundation. Preface. The Finances of the Performing Arts, Vol. I. New York, 1974.

[9] Ibid.

[10] Ibid. pp. 28-29.

METHOD OF CONSTRUCTING THE UNIVERSE

To construct the universe, we took the most complete data and/or made an estimate for each of these disciplines:

- Orchestra
- Opera
- Theater
- Musical Theater
- Dance
- Choral Music
- Chamber Music
- Jazz Groups
- Other Performing Arts
- Museums
- New Arts Spaces/Alternative Spaces
- Media Arts Centers
- Literature
- Crafts Membership Organizations

We eliminated known or obvious overlaps and then added all the disciplines together.

In the discussion of each discipline, the first set of figures present the reported data on number of organizations, total dollars, and sometimes average dollars per organization. This is given by year for each data set found to be applicable. Sometimes a second comparison figure is presented showing total dollars for the discipline, average dollars per organization (or subgroups of organizations), and/or number of organizations of a given budget size. From these two sets of figures, we tried to discern whether the same organizations were represented in the two data sets so that double counting of organizations could be eliminated; if no duplication could be discerned, the data sets were simply added together.

As was often the case, the data sets covered some but not all of the same organizations. Therefore, an assessment was made to decide which data set was most complete, and that data set was used. Estimates from service organizations and others knowledgeable about the discipine were sought on the number of organizations in the universe not already counted and the average budget size of those organizations (usually given to us in a range of budget sizes). We multiplied the estimates of the number of organizations by the estimated budget sizes and got an estimate of a range of total dollars for the portion of the universe for which no hard data existed, in order to arrive at a general figure for the economic size of the discipline. Since in most disciplines the larger organizations are included in reported data bases, estimates of the smaller sized organizations in the universe can be very rough and yet mistakes will not have a significant impact on the economic size of the universe.

In the final part of each chapter, all the discipline estimates are added together. Known overlap among and between disciplines was estimated. The result is a very rough estimate of the size of the universe of nonprofit arts and cultural organizations. Under several disciplines, additional analyses are presented (e.g., age of the organizations, attendance figures, and some measures of growth), if the data were available and if such analyses were not presented elsewhere in this report.

CONSTRUCTION OF THE UNIVERSE

Symphony Orchestra

Although both the U.S. Economic Censuses and the NRCA study include orchestras, the most comprehensive estimate of the universe comes from the American Symphony Orchestra League (ASOL). The Research and Reference Department of ASOL has collected detailed, consistent data from many of its members, dating back to the 1950s. Its membership includes all the largest symphonies, most of the middle-sized symphonies, and a good proportion of the small community symphonies. ASOL categorized orchestras (as of the end of the decade) into these budget groups:

Major: over $2,000,000
Regional: between $500,000 and $2,000,000
Metropolitan: between $100,000 and $500,000
Urban: between $50,000 and $100,000
Community: under $50,000 (this category includes youth orchestras and all but the few large chamber orchestras)
College and University

Although ASOL has not surveyed the universe of orchestras, it has been tracking the field and has made estimates of the size of the universe of orchestras. For the three largest categories of membership, however, ASOL has collected data over the decade for a large portion of the orchestras and has imputed data for the missing orchestras in these categories. These three categories account for 90 to 95 percent of the dollar economic activity of the orchestra universe.

Figure 3-4[11] compares ASOL reported data, membership, and estimates of the universe with the two Census figures (1972 and 1977) and with the NRCA figure (1976). The first column includes the total of the three larger categories (all Major, Regional, and Metropolitan orchestras) plus any urban or Community orchestras that reported to ASOL for the year. Data on organizations from ASOL were not available for 1980. For membership in ASOL, only the first and last years of the decade are shown, because this figure is not a measure of the growth of the orchestra universe or any subsection, only of growth in ASOL membership.

The Census figures reflect a smaller universe with a higher concentration of the large organizations from which the Census collects data. Figure 3-2 presented earlier shows a Census printout covering the performing arts. Census has two problems in addition to its universe population: The "Not Appropriately Self-Deisgnated" counts for both 1972 and 1977 include a significant number of unclassified organizations (see discussion earlier in the chapter), and chamber music is a separate category. This category would probably include the five larger chamber orchestras in the ASOL data base.

NRCA's universe of organizations with budgets over $3,000 or $5,000 (see Appendix A) includes more small organizatons than reported to ASOL. (An ASOL universe estimate for 1976 is not available.) Figure 3-5 shows average budget sizes and also provides another indication of how Census and NRCA compare with ASOL. Although NRCA's figures are based on a sample projected to their universe, the number of orchestras (142) with budgets over $100,000 compares adequately with ASOL's 136 orchestras. NRCA has 354 symphonies under $100,000 in their projected universe, a total figure that is not inconsistent with but is lower than the ASOL 1977 figures.

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[11] There are 1 to 8 Figures for each discipline.

THE ORCHESTRA DATA SETS

	Organizations Reporting $ to ASOL*		ASOL Membership	ASOL Estimates of the Universe	Census Bureau**		NRCA Study	
	Number of Organizations	Total $*** (000's)	Number of Organizations	Number of Organizations	Number of Organizations	Total $*** (000's)	Number of Organizations	Total $*** (000's)
1969	—	—	373	—	—	—	—	—
1970	169	$77,962	—	—	—	—	—	—
1972	167	$ 92,463	—	1,460	98	$ 64,117	—	—
1976	209	$144,357	—	—	—	—	495	$157,741
1977	233	$164,832	—	1,450	167	$143,173	—	—
1980	—	—	706	1,500	—	—	—	—

*These include all Major, Regional and Metropolitan Orchestras, all with reported or imputed (by ASOL) budget size and any Urban or Community Orchestra that reported. These figures do not represent all Orchestras in these categories. ASOL figures include Chamber Orchestras, but not other Chamber Music. Census and NRCA have a separate Chamber Music category. There are only a handfull of true Chamber Orchestras. Most are Chamber because of budgetary problems, not through choice.

**Do not compare 1972 and 1977 figures, for the universe from which Census collected data differed. (See earlier discussion on the Economic Census.)

***Measured by total operating expenses.

FIGURE 3-4

COMPARISON OF SYMPHONY ORCHESTRA DATA SETS

Source and Year of Data	Number of Organizations	Total $ * (000's)	Average*$ (000's) Per Organization
CENSUS: 1972	98	$ 64,117	$654
ASOL: 1972	167	92,463	554
NRCA: 1976	495	157,741	319
ASOL: 1976	209	144,357	691
CENSUS: 1977	167	143,173	857
ASOL: 1977	233	164,832	707

ASOL figures are for all Major, Regional and Metropolitan Orchestras (i.e., those over $100,000) and any smaller orchestra that reported data.

*Measured by total operating expenses.

FIGURE 3-5

Another source of data, the 1980 IRS Exempt Organization Master File (the EOMF is described earlier in this chapter), was used to count the number of organizations that had the words "symphony," "orchestra," philharmonic," etc., in the title. By this method, 720 symphonies were found, including those with the words "chamber" or "association" in their names, but excluding "symphonette," "chamber players," "ensemble," "women's guilds," "societies," "friends of," and "institutes."

Figures 3-6 and 3-7 are worksheets showing the development of a total dollar size of the universe. The numbers of organizations in each size category represent ASOL estimates. The left-hand columns show the organizations reporting to or imputed by ASOL. The columns on the right show additional organizations for which we estimated the dollar figures. For each category, a range of budget size was used. The range chosen is probably on the low side of what an actual figure for these organizations might be. However, these organizations do not have much influence on the total dollar size of the discipline. Thus, the orchestra universe can be estimated in 1977 to be 1,450 orchestras at $171 to $176 million and, in 1980, to be 1,500 orchestras at $261 to $274 million.

Figure 3-8 recombines the two previous figures to show orchestras by level of "professionalism," for which we arbitrarily made the cutoffs at $100,000 and $50,000. Any lower budget level cutoff does not allow detailed presentation of the ASOL data. Comparing Figures 3-6 and 3-7 with the two columns of 3-8, one can see a shift from the Urban category to the Metropolitan category, but the total number of orchestras in Urban, Metropolitan, Regional, and Major (all orchestras over $50,000) stayed the same over the three-year period.

Figure 3-9 shows a set of figures provided by ASOL on the three largest categories of orchestras over the decade (all orchestras over $100,000). The number of orchestras included are shown below the ASOL figures. Over the decade, the number of orchestras increased from 125 to 176. However, inflation over the decade was severe and much of the growth shown in these figures was due to inflation. To match a 1970 budget of $100,000 in real terms (with inflation removed), required a budget of $205,000 in 1980. Therefore, the total budget size of $252.1 million (gross expenses in 1980) in 1970 dollars is $123.8 million, or a real growth of $46.6 million from the $76.4 million of 1970, not a tripling of the total gross expense.

ESTIMATE OF TOTAL BUDGET SIZE OF ORCHESTRA UNIVERSE - 1977

	Reported to ASOL			Additional Organizations Estimated Total $		
	Number of Organizations	Total $ (000's)	Average $ Size (000's)	Number of Organizations	Range of Total $ (000's)	Range of Average $ Size (000's)
Major, Regional and Metropolitan	140	$160,911	$1,149	—	—	—
Urban	36	2,696	75	33	$1,980-2,475	$60-$75
Community	57	1,225	21.5	676	3,804-4,880	—
				(100 at (576 at	1,500-2,000 2,304-2,880	15-20) 4-5)
Chamber	—	—	—	5	90-105	**
Youth	—	—	—	150	150-600	1-4
College/University	—	—		356	1,068-3,560	3-10
	233	$164,832		1,220	$7,092-11,62	

TOTAL: 1,453 Orchestras at $171,924,000 - $176,452,000

*Not all reported to ASOL; Missing organizations imputed by ASOL.

**Of the 5 Chamber Orchestras included here, 2 reported budget sizes of $74,000 and $48,000 in 1978. They were estimated for 1977 at $50,000 and $25,000, respectively, and the other three at a range of $5,000 to $10,000.

FIGURE 3-6

ESTIMATE OF TOTAL BUDGET SIZE OF ORCHESTRA UNIVERSE - 1980

	Reported to ASOL			Additional Organizations Estimated Total $		
	Number of Organizations	Total $ (000's)	Average $ Size (000's)	Number of Organizations	Range of Total $ (000's)	Range of Average $ Size (000's)
Major, Regional and Metropolitan	176 *	$252,134	$1,432	—	-	—
Urban**	—	—	—	33	$1,980-2,805	$60-85
Community** (total)	—	—	—	636	4,180-7,860	—
				(100 at	1,500-2,500	15-25)
				(536 at	2,680-5,360	5-10)
Chamber***	—	—	—	140	700-4,200	5-30
Youth	—	—	—	150	450-1,050	3-7
College/University	—	—		370	1,850-5,550	5-15
	176	$252,134		1,329	$9,160-$21,465	

TOTAL: 1,505 Orchestras at $261,294,000 - $273,599,000

*Not all reported to ASOL; Missing organizations imputed by ASOL.

**Reported figures were not obtained from ASOL; therefore, all orchestras were imputed.

***Chamber Orchestras include many orchestras that aspire to Symphony size, but budgetary realities force them into this category.

FIGURE 3-7

THE UNIVERSE OF ORCHESTRA BY LEVEL OF "PROFESSIONALISM"

Level	1977 Number of Organizations	1977 Total $ (000's)	1980 Number of Organizations	1980 Total $ (000's)
Professional All Major, Regional and Metropolitan (over $100,000)	140	$160,911	176	$252,134
"Serious"/Professional All Major, Regional, Metropolitan and Urban (over $50,000)	209	165,587-166,082	209	254,114-254,939
Community (includes Chamber and Youth)	888	5,269-6,810	926	5,330-13,110
College/University	356	1,068-3,560	370	1,850-5,550
TOTAL	1,453	$171,924-$176,452	1,505	$261,294-$273,599

FIGURE 3-8

FINANCIAL AND OPERATIONAL STATISTICS -- MAJOR, REGIONAL, AND METROPOLITAN ORC[illegible]AS -- 1969-70 -- 1979-80
(In thousands)

	1969-70	1970-71	1971-72	1972-73	1973-74	1974-75	1975-76	1976-77	1977-78	1978-79	1979-80
EARNED INCOME (Ticket Sales and Fees)	$ 34,987.0	37,356.6	40,549.3	44,001.0	48,265.7	57,046.0	64,862.6	74,180.0	86,370.3	103,458.4	118,238.8
TAX-SUPPORTED GRANTS	5,062.9	8,145.0	10,295.4	11,098.8	16,195.1	18,757.1	20,023.7	20,814.2	25,074.6	32,036.6	33,396.2
PRIVATE SECTOR SUPPORT	25,112.8	27,383.6	25,623.2	29,451.2	33,755.1	34,843.0	38,675.7	44,314.8	50,504.0	62,196.8	71,700.8
ENDOWMENT AND INTEREST	8,116.9	8,430.8	11,143.9	12,208.5	13,151.0	13,892.9	13,420.4	14,759.4	16,111.4	19,050.1	23,039.7
GROSS INCOME	$ 73,279.6	81,316.0	87,611.8	96,759.5	111,366.9	124,539.0	136,982.4	154,068.4	178,060.3	216,741.9	246,375.5
ARTISTIC PERSONNEL EXPENSE	$ 47,391.7	51,384.8	54,306.0	60,292.3	69,877.8	77,623.5	84,875.8	96,055.2	105,931.4	121,331.5	135,841.1
PRODUCTION EXPENSE	19,335.4	21,339.9	24,746.4	25,852.4	29,031.3	33,728.4	36,403.2	41,380.2	49,947.0	64,399.2	79,794.6
ADMINISTRATION	9,669.6	11,371.4	12,275.7	13,345.3	15,751.1	18,151.1	20,257.7	23,475.4	27,203.4	35,243.7	36,498.2
GROSS EXPENSE	$ 76,396.7	84,096.1	91,328.1	99,490.0	114,660.2	129,503.0	141,536.7	160,910.8	183,081.8	220,974.4	252,133.9
(DEFICIT)	$ (3,117.1)	(2,780.1)	(3,716.3)	(2,730.5)	(3,293.3)	(4,964.0)	(4,554.3)	(6,842.4)	(5,021.5)	(4,232.5)	(5,758.4)
TOTAL ATTENDANCE*	12,667.3	15,778.4	16,089.6	16,833.2	18,336.2	18,326.6	20,032.1	21,032.1	21,383.3	22,405.1	22,597.2
TOTAL PERFORMANCES	6599	11450	11612	11849	13052	14171	14776	17421	18027	22096	22229
Number of Orchestras	125	N/A	129	N/A	N/A	N/A	136	140	165	172	176

*12,667.3 = 12,667,300

Source: Research and Reference Department
American Symphony Orchestra League
7/1/81 lg

FIGURE 3-9

Furthermore, of the 51 orchestras that came into the ranks of the Metropolitan, Regional, and Major group, some entered because of inflation, not real growth. Using 1979 data (the last year that individual organization data was available), the 1970 equivalent budget size would be $181,000. ASOL data shows 104 orchestras above and 23 below that cutoff in 1979, with 45 not reporting, for the 1972 total orchestras shown in Figure 3-9. All of the orchestras not reporting are in the Metropolitan category, and if one assumed (for simplicity's sake--no better assumption available) that there is no budget size difference between those reporting and those not reporting, then the number of orchestras over $181,000 would be 133. The theoretical maximum would be 150 orchestras, assuming that all those not reporting were over $181,000. But a more likely figure would be 133 or less, rather than more because smaller organizations more often tend not to report than do larger groups. No matter which figure one chooses, the growth does not reflect the phenomenal figure that results with inflation included. Chapter 5 goes into detail about the growth of symphony orchestras themselves, rather than just the universe. However, because the data base available on orchestras was large, Chapter 5 does conclude with some projections about the universe, an analysis that cannot be made on any other discipline.

OPERA

There are seven sources of data about opera activity during the 1970s. Although the numbers of organizations and the dollar figures of any two data sets do not match exactly, they reasonably approximate one another.

The Central Opera Service (COS) has been tracking the number of opera companies and other opera-producing organizations since the mid-1950s. The data are not sufficiently detailed to study the growth of the organizations themselves, but this source does provide a useful picture of the universe. The COS categories are these:

- Companies over $100,000
- Companies $25,000 - $100,000
- Avocational/Clubs, etc.
- Orchestra/Festival/Chorus
- Nonprofit Theater
- College/University Workshops

Dollar figures are presented for years after 1976, but these figures are totals only. Furthermore, 20 percent of the total organizations in the COS data and about 10 percent of the total dollars represent orchestras, nonprofit theaters, and other such organizations. Orchestras and nonprofit theaters belong to other discipline groups, on which more comprehensive data are available from other sources. Therefore, to avoid the overlap problems, the universe of opera companies is presented next. However, these overlapping organizations are sometimes presented in the Figures in order to reconcile the dollar estimates with the data reported by COS.

The National Opera Institute (NOI) conducted a census in 1977 of all opera and musical theater companies. The criteria that NOI used for inclusion in the census are listed in Appendix A. A basic requirement was that the company had presented a fully staged opera or operas in each of the previous three years. Although the NOI data were not subjected to rigorous editing controls, the total expense figures usually match figures reported in other data sets. Data on individual organizations were available, allowing greater reliance on the totals given in the data.

OPERA America began collecting data from member companies in 1974 and from correspondent companies in 1978. Not all members are included in any one year. (In fact, in 1977 three member companies did not report to OPERA America, but did report to the NOI census. Therefore, NOI figures were added to OPERA America figures to create more comprehensive totals.) OPERA America data are presented in detail sufficient to allow some analysis of growth of individual organizations over the years included in the data set. This analysis is the subject of Chapter 6. The criteria used by OPERA America for membership (see Appendix A) are the most rigorous of any data set on opera.

The Census Bureau and the NRCA study (both described earlier in this chapter) also cover opera companies. Two other data sets also presented useful data but reflected only a subset of the opera universe (operas over $100,000). These are the Ford Foundation data and a 1970 study on opera conducted by Sureva Seligson[12/] for the National Endowment for the Arts (see Figure 3-13).

[12/] Seligson, Sureva. Opera Survey. National Endowment for the Arts, 1970.

Figure 3-10 compares the COS and NOI data sets with the Census Bureau and NRCA data and the membership data of OPERA America. As with the orchestra universe, no dollar figures can be constructed for this universe for 1970. The COS figures are the largest, both in number of organizations and in dollars, because it measures a larger universe that includes all opera-producing organizations and not just opera companies. The difference is approximately 200 orchestras, festivals, choruses, and nonprofit theaters that produce some opera. NOI included these organizations, too, but since data were available on individual organizations, these organizations were eliminated from NOI's figures.

One other source of number of operas, not included in any of the Figures on opera, is the Internal Revenue Service file of organizations (see earlier discussion of IRS universe and data). The file contains about 270 opera organizations, including those whose titles contained "Opera Association" or "Society," "Light," "Operetta," "House," and "Festival," but excluding those termed "Institute," "Workshop," "Friends of," "Appreciation Societies," and the Royal Opera House of Covent Garden, a non-American Company.

Figure 3-11 provides another comparison of these data sets by showing total and average dollars per organizations with and without the Metropolitan Opera. The Met had a budget equal to almost half of the total universe dollars in the beginning of the decade and to about a third of the universe at the end of the decade. As with orchestra, the difference in the averages reflects the different populations included. NRCA's projected universe (1976) includes many smaller organizations. OPERA America's membership data (1974 and after) reflects the biggest organizations which even without the Met show an average budget size of over $1 million. The inclusion of the smaller correspondent members drops the average. The average size of an organization in the U.S. Census data is only marginally below that of the COS above-$100,000 group, but is considerably higher than the NOI average (a third of whose population is below $100,000). Therefore, one can conclude that the Census found few smaller companies. When compared with OPERA America data, it would appear that the Census total dollar figures do not include some larger opera companies. In fact, it is likely that the Census missed the second largest company, the New York City Opera (with a budget of over $7 million) because it is part of a larger umbrella organization that is probably in the census under "other performing arts" category.

THE OPERA DATA SETS

	Central Opera Service*		National Opera Institute**		Opera America***		Census Bureau****		NRCA Study	
	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)
1970	648	—	—	—	—	—	—	—	—	—
1972	—	—	—	—	—	—	31	$37,167	—	—
1975	807	—	—	—	31	$ 60,647	—	—	—	—
1976	913	$ 98,500	—	—	38	$ 68,288	—	—	200	$78,499
1977	914	$110,400	103	$89,388	43	$ 81,179	46	$63,282	—	—
1979	966	$146,400	—	—	69	$105,918	—	—	—	—
1980	986	$175,800	—	—	—	—	—	—	—	—

*Central Opera Service includes all organizations producing opera, which in 1979 and 1980 included 125 and 124 "Orchestra/Festival/Chorus" organizations, respectively, and 71 and 83 Nonprofit Theaters, respectively.

**National Opera Institute data included 12 organizations ($11,802,694) which were symphonies and/or sponsors of performing arts which are excluded from the data above.

***Opera America data includes only the largest opera companies through 1977. Wolf Trap has been excluded from these figures. Smaller corresponding companies are included in 1979. In 1977, three Operas who did not report to Opera America but who did report to National Opera Institute are included. 1980 data were not yet available.

****Do not compare 1972 and 1977 Census figures because of differences in the universes represented in the data (see earlier discussion on the Economic Censuses).

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FIGURE 3-10

COMPARISON OF OPERA DATA SETS

Source and Year of Data	Number of Organizations	Total $ (000's)	Avg. $ (000's) Per Organization	Total $ w/o MET (000's)	Avg. $ (000's) w/o MET Per Organization
1976					
NRCA	200	$ 78,499	$ 392.5	$ 50,474	$ 253.6
Opera America	38	68,288	1,797.1	40,263	1,088.2
COS (All organizations)	913	98,500	107.9	70,475	77.3
COS (over $100K only)	65	71,800	1,104.6	43,775	683.9
1977					
Census	46	63,282	1,375.1	32,107	713.5
Opera America*	43	81,179	1,887.8	50,004	1,190.6
NOI	103	89,388	867.8	58,213	570.7
COS (all organizations)	914	110,400	120.8	79,225	86.7
COS (over $100K only)	68	79,700	1,172.1	48,525	724.3
1979					
Opera America	43	102,577	2,385.5	62,947	1,498.7
Opera America (including corresponding companies	69	105,918	1,535.0	66,288	974.8
COS (all organizations)	966	146,400	151.5	106,778	110.6
COS (over $100K only)	95	111,500	1,173.7	71,870	764.6

*Includes 3 non-reporting members whose data from NOI Census were used.

FIGURE 3-11

Figure 3-12 is the data summary supplied by COS. The top half covers a 25-year span and shows that the number of companies and other organizations producing opera had more than doubled during that period. Even taking into account nonresponse and any inadvertant exclusion of organizations, this reflects considerable growth. The bottom half provides more detail for the last two years, which allows the elimination of orchestra/festival/chorus and theater categories overlap.

These statistics also provide an indication of the growth in number of performances and size of audience. However, it should be noted that the data in the bottom half show that of all performances (9,391 in 1980 and 8,554 in 1979), about one-third were given by orchestras, festivals, choruses, avocational/clubs, and nonprofit theaters, i.e., not opera companies of $25,000 or more. Almost another third were college and university workshop performances. Thus, 3,563 performances in 1980 and 3,311 performances in 1979 were presented by opera companies with budget size over $25,000.

Almost all of the data sets segregated companies over $100,000 and reported their total expenses. These are presented in Figure 3-13. Since data on individual organizations were available for all data sources except COS, a combined figure for two data sets in each of three years was calculated to provide a more complete total. In 1970, significant difference (more than 5 percent) between the two data sets were found for eight companies. Since the Ford Foundation data were laboriously edited, they were used as the base, with the Seligson data for additional organizations added to it. As discussed earlier in the chapter, these discrepancies are not significant when measuring the total universe. The same problem arose between OPERA America and NOI data for 1977. OPERA America data was used as a base and additional NOI operas were added to it. Without data on individual organizations, one cannot determine why the 35 companies in COS in 1970 reported over $2 million more than these sources and the 68 companies (four more than NOI and OPERA America) reported $7 million less in 1977.

The COS data on Figure 3-13 reflects a tripling of the number of larger opera companies over the decade and an even greater increase in the total dollars. Figures 3-14, 3-15, and 3-16 reflect universe estimates using COS classification for opera companies and groups. As in the orchestra discussion,

CENTRAL OPERA SERVICE ANNUAL SURVEY STATISTICS

PERFORMING GROUPS*		79-80	78-79	77-78	76-77	74-75	69-70	64-65	54-55
Companies: over $100,000 budget		109	95	78	68	54	35	27	na
Companies: other		458	456	458	424	335	266	296	280
College/University workshops		419	415	420	422	418	347	409	167
	Total	986	966	956	914	807	648	732	447
Number of Performances									
Standard repertoire		5,482	5,181	5,191	4,574	4,097	3,011	2,643	1,844
Contemporary foreign repertoire		548	609	523	622	2,331	1,768	1,533	1,373
Contemporary American repertoire		3,361	2,764	2,092	2,193	na	na	na	na
	Total	9,391	8,554	7,806	7,389	6,428	4,779	4,176	3,217
Musicals (not included in total)		1,397	1,430	906	217	na	na	[illegible]	na
		(10,788)	(9,984)	(8,712)	(7,606)	na	na	na	na
Number of Operas Performed									
Standard		237	242	237	226	209	178	167	103
Contemporary (foreign)		47	54	55	44	71	163	164	107
Contemporary (American)		213	202	156	157	107	na	na	na
	Total	497	498	448	427	387	341	331	210
Musicals (not included in total)		104	72	43	34	na	na	na	na
World Premieres		79	64	42	33	16	17	na	na
American Premieres		22	18	21	14	11	18	na	na
Audiences (in millions)		10.7	9.94	9.76	9.20	8.00	4.60	na	na
Expenses (in millions)									
Companies: over $100,000 budget		$133.6	$111.5	$96.3	$79.7	na	$36.5	na	na
Companies: $25,000-$99,999 budgets		3.7	3.8	4.4	3.5	na	na	na	na
All others		38.5	31.1	29.8	27.2	na	na	na	na
	Total	$175.8	$146.4	$130.5	$110.4	na	$36.5	na	na

*DETAIL OF PERFORMING GROUPS		number of companies		number of performances	
		1979-80	1978-79	1979-80	1978-79
Companies: budget over $1 million		16	15		
Companies: budget over $500,000		22	15		
Companies: budget over $200,000		31	29		
Companies: budget over $100,000		40	36		
	sub-total	109	95	2,779	2,442
Companies: budget over $50,000		42	37		
Companies: budget over $25,000		26	36		
	sub-total	68	73	784	869
Orchestra/Festival/Chorus		124	125		
Avocational/Clubs, etc.		183	187		
Theatres (non-profit)		83	71		
	sub-total	390	383	3,219**	2,777
Total Companies		567	551		
College/University Workshops		419	415	2,609	2,468
Total Opera Producing Organizations		986	966	9,391	8,554

MISCELLANEOUS

	1979-80	1978-79	
Companies: community/educational service programs	135	122	4,281 (in addition to regular season)
Academia: community/educational programs	97	35	796 (in addition to regular season)
Audiences at above (in millions)	2.5	na	

Light repertoire of opera companies and workshops and the 83 non-profit theatres

Gilbert & Sullivan (14)	829	679	performances
Classical operetta (18)	517	502	"
Musicals (104)** (not included in total)	1,397	1,430	"
	2,743	2,611	

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FIGURE 3-12

OPERA COMPANIES OVER $100,000

	Central Opera Service		Ford Foundation*		Opera America		Other One Year Surveys**		Combined***	
	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)
1970	35	$ 36,500	31	$33,617	—	—	35	$34,218	37	$34,866
1971	—	—	31	$38,743	—	—	—	—	—	—
1972	—	—	29	$44,326	—	—	—	—	—	—
1973	—	—	29	$49,221	—	—	—	—	—	—
1974	—	—	29	$54,039	31	$ 50,761	—	—	37	$58,093
1975	54	—	—	—	31	$ 60,647	—	—	—	—
1976	—	—	—	—	38	$ 68,288	—	—	—	—
1977	68	$ 79,700	—	—	40	$ 78,654	64	$86,609	64	$86,756
1978	78	$ 96,300	—	—	46	$ 92,899	—	—	—	—
1979	95	$111,500	—	—	60	$105,356	—	—	—	—
1980	109	$133,600	—	—	—	—	—	—	—	—

*1970 and 1971 from published data; 1972 through 1974 from unpublished data. Five operas were not covered in the later data and three newer operas whose budgets grew to over $100,000 in 1972 were added.

**1970 Opera Survey for the National Endowment for the Arts by Sureva Seligson
1977 Data: National Opera Institute Census of Opera Companies.

***Where individual data was available, organizations reporting to two data sources were compared to identify as many operas as possible. In 1970, Ford had 26 operas over $100,000 and Sureva Seligson's survey for NEA had an additional 11 operas with $2.528 million. All of the published Ford operas are included in either Ford unpublished individual data or in Seligson's data. In 1974, Opera America had 31 operas over $100,000. In Ford, another 6 operas were found for a total of 37 operas over $100,000. In 1977, National Opera Institute included all operas over $100,000 also found in Opera America. However, Opera America accounted for $147,000 more for those operas than NOI. In 1977, COS reported 4 more companies, but about $7 million less.

FIGURE 3-13

ESTIMATE OF TOTAL BUDGET SIZE OF OPERA UNIVERSE: 1977

	Reported Total $			Estimated Total $		
	Number of Organizations	Total $ (000's)	Average $ (000's) Per Organization	Number of Organizations	Range of Total $ (000's)	Range of Average $ Per Organization (000's)
Companies Over $100,000 (Source: NOI)	64	$86,756	$1,355.5			
Other Companies (Source: NOI)	39	2,779	71.3			
Other Companies Over $25,000 (Source: COS minus NOI (above))				27	702 - 1,350	26 - 50
Avocational Groups (Source: COS)				175	700 - 857	4 - 5
College and University Groups (Source: COS)				422	1,266 - 4,220	3-10
TOTALS	103	$89,535		624	$2,668 - $6,427	

TOTAL OPERA COMPANIES/GROUPS: 727 Organizations at $92,203,000 - $95,962,000

OTHER OPERA PRODUCING ORGANIZATIONS:

			Average Size
Orchestras/Festivals/Choruses (Source: COS)	120	$9,150,000 - $18,300,000	$50,000 - $100,000
Nonprofit Theaters	63		
TOTAL OPERA PRODUCING ORGANIZATIONS AS ESTIMATED	910	$101,353,000 - $114,262,000	
TOTAL OPERA PRODUCING ORGANIZATIONS AS REPORTED BY COS	914	$110,400,000	

FIGURE 3-14

ESTIMATE OF
TOTAL BUDGET SIZE OF OPERA UNIVERSE: 1979

	Reported by COS		Estimated Ranges	
	Number of Organizations	Total $ (000's)	Total $ (000's)	Average $ (000's)
Companies over $100,000	95	$111,500		
Companies $25,000 - $100,000	73	3,800		
Avocational/Clubs, etc.	187		$1,403 - $2,805	7.5 - 1
College/University	415		4,150 - 6,225	10 - 15
TOTALS	770	$115,300	$5,553 - $9,030	
TOTAL OPERA COMPANIES/GROUPS	770	$120,853,000 - $124,330,000		
Orchestra/Festival/Chorus	125		$25,547 - $22,070	130-112
Nonprofit Theaters	71			
TOTAL OPERA PRODUCING ORGANIZATIONS (as reported by COS)	966	$146,400,000		

FIGURE 3-15

ESTIMATE OF
TOTAL BUDGET SIZE OF OPERA UNIVERSE: 1980

	Reported by COS		Estimated Ranges	
	Number of Organizations	Total $ (000's)	Total $ (000's)	Average $ (000's)
Companies over $100,000	109	$133,600		
Companies over $25,000	68	3,700		
Avocational/Clubs, etc.	183		$1,830 - $3,650	10 - 20
College/University	419		5,030 - 7,950	12 - 19
TOTALS	779	$137,300	$6,860 - $11,600	
TOTAL OPERA COMPANIES/GROUPS	**779**	$144,160,000 - $148,900,000		
Orchestra/Festival/Chorus	124		$31,640 - $26,900	152 - 130
Nonprofit Theaters	83			
TOTAL OPERA PRODUCING ORGANIZATIONS (as reported by COS)	986	$175,800,000		

FIGURE 3-16

reported figures are shown on the left side and estimated ranges are on the right, along with the averages used to arrive at the total estimates. Since opera companies are only one subpart of the total arts universe, the total COS figures cannot be used because nonprofit theaters, orchestras, and choruses are included in their own separate classifications.

On the basis of these calculations, the size of the universe of opera companies is estimated as follows:

1977: 727 organizations at $92-96 million
1979 770 organizations at $121-124 million
1980: 779 organizations at $144-145 million

Figure 3-17 recasts the data for these three years by "level of professionalism." As in the orchestra discussion, this exhibit shows that the over-$100,000 opera organizations, although small in number, represent most of the economic activity. Over the three years, the over-$100,000 opera companies represent from 21 to 30 percent of all non-college/university organizations and account for 95 to 96 percent of the total dollars. The inclusion of the college/university groups does not alter the economic picture in any significant way. The over-$100,000 opera organizations account for 15, 12, and 14 percent, respectively, of the total organizations and for 90 percent of the dollars in each year.

As was done with orchestra figures, the economic growth of large opera companies (over $100,000) was calculated both with and without inflation. From data in Figures 3-12 and 3-13, the 'real' growth was calculated with inflation removed. By means of the CPI index, 1979 dollars are deflated by 1.81 to equal 1970 dollars, and 1980 dollars are deflated by 2.05.

1970: 35 or 37 operas at $36.5 or 34.9 million
1979: 95 operas at $111.5 million (actual $) or $61.6 million (real $)
1980: 109 operas at $133.6 million (actual $) or $65.2 million (real $)

Thus, these larger opera companies showed a real growth of 80 percent by the end of the decade (from approximately $35 million to $60 million).

THE UNIVERSE OF OPERA COMPANIES/GROUPS BY LEVEL OF "PROFESSIONALISM"

Level	1977 Number of Organizations	1977 Total $ (000's)	1979 Number of Organizations	1979 Total $ (000's)	1980 Number of Organizations	1980 Total $ (000's)
Professional (over $100,000)	64	$86,756	95	$111,500	109	$133,600
Serious/Professional (all operas over $25,000)	130	90,237 - 90,885	168	115,300	177	137,300
Avocational/Community	175	700 - 857	187	1,403 - 2,835	183	1,830 - 3,650
College/University	422	1,266 - 4,220	415	4,150 - 6,225	419	5,030 - 7,950
TOTAL	727	$92,203 - $95,962	770	$120,853 - $124,330	779	$144,160 - $148,900

FIGURE 3-17

Some of that growth is due to new companies joining the $100,000 ranks. However, the 1980 equivalent or a 1970 over-$100,000 opera company would be one with a budget of $205,000. COS shows the number of companies over $200,000 in 1980 to be 69.

In 1970, the number of companies over $100,000 was 35. Thus, in real terms, the number of companies to reach this threshold almost doubled.

COS does not provide total dollar breakouts for subgroups over $100,000, so we cannot calculate an equivalent total dollar size for these 69 organizations. To match orchestra calculations, 1979 figures would have to be used. In 1979, the equivalent $100,000 budsget size would have had to be $181,000. COS breakouts do not come close enough to approximate this analysis for 1979.

In comparison with the orchestra data which shows a relatively modest growth in the number of larger organizations, the number of opera companies equivalent to $100,000 in 1970 dollars almost doubled. Real dollar growth of all $100,000 organizations between 1970 and 1980 was 80 percent, as compared with about 60 percent for the orchestras. Chapter 8, which discusses the growth of opera companies in more depth, also reflects this greater growth of larger operas in comparison with larger orchestras. The conclusion that can be drawn is that considerable growth in the universe of opera companies did occur during the 1970s.

Figures 3-18 and 3-19 use NOI data to show the age of opera companies that had continuous operations through 1977. Figure 3-19 shows that a significant number of larger and smaller companies are relatively young: over half of both the smaller and larger companies have been in continuous operation less than 20 years. Of the 100 opera companies that met the more stringent criteria of at least three years of production (another three had only two years of productions), 25 were founded during the 1970s. That statistic equates to a founding date in the first half of the decade with no opera founded in the second half of the decade eligible for inclusion. Although one cannot compare these findings with the COS data (Figure 3-12) because of inconsistency in reporting, the findings are not necessarily inconsistent with COS.

AGE OF OPERA COMPANIES

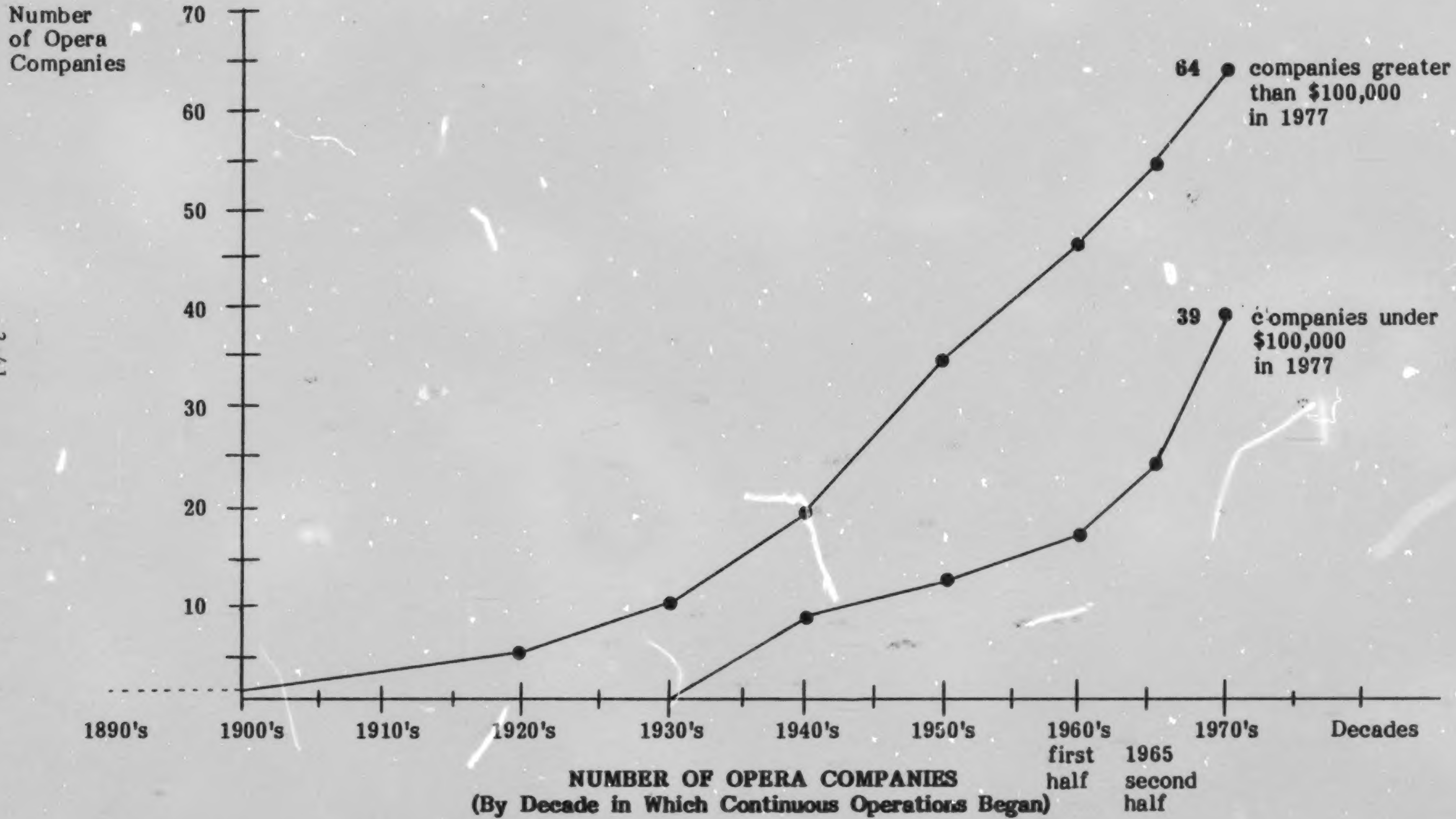
Years in Which Continuous Operation Began*	Operas > $100,000	Operas < $100,000	Totals
1970 - 1977	11	16	27
1965 - 1969	7	6	13
1960 - 1964	12	4	16
1950 - 1959	14	5	19
1940 - 1949	9	8	17
pre 1940**	11	0	11
TOTALS	64	39	103

*Source of Data: National Opera Institute - Question asked was, "How many years in continuous operation?"

**Of these 11 operas, 7 began continuous operation in the 1930s, and 3 in the 1920s, and the Metropolitan Opera pre-dates the turn of the century.

FIGURE 3-18

NUMBER OF OPERA COMPANIES IN CONTINUOUS OPERATION (AGE OF OPERA)



Source of Data: National Opera Institute (Total of 103 Opera Companies) - See Figure 3-18.

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FIGURE 3-19

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THEATER

Several sources of data on theater exist for the 1970s, but none attempts to describe the universe of theater at either the beginning or the end of the decade. The only year for which the universe can be documented in 1977. Three data sets that contain theater are described in the first part of this chapter: Ford Foundation, Economic Census (Census Bureau), and the NRCA study. Three other sources have theater data worth examining.

One source is a study done for the National Endowment for the Arts by Sureva Seligson.[13/] The data were gathered without strict standards, but appear to be reasonably reliable for rough universe analysis.

The Theatre Communications Group (TCG), "a national service organization for the nonprofit professional theatre in the United States," began its annual survey in 1974. Only theaters with budgets above $200,000 were included in 1974 and 1975; from 1976 on, the minimum budget size for inclusion has been $25,000.

In 1977, the National Endowment for the Arts sponsored a special survey on theater.[14/] The results of this very comprehensive study are also contained in the National Endowment for the Arts Research report.[15/] The only difficulty in working with the MATHTECH data is that a clear nonprofit-profit breakout was not provided because most of the data used by the researchers was not thus classified. The text of the report implies nonprofit (tax-exempt) status for some but not all subgroups. MATHTECH also did not provide any universe dollar figures, although numbers of organizations in the universe are given.

To estimate the dollar size of the universe, U.S. Census figures and averages are used to supplement data reported by MATHTECH. The Economic Census data on

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[13/] Seligson, Sureva. Economic Aspects of the Performing Arts: A Portrait in Figures. National Endowment for the Arts, 1971.

[14/] MATHTECH. The Conditions and Needs of the Live Professional Theatre in America. National Endowment for the Arts, 1977.

[15/] National Endowment for the Arts, Research Division. Conditions and Needs of the Professional American Theatre. Report No. 11, 1981.

theater are more useful than any other performing arts because theater is given a separate SIC Code, and the Census provides data on nine subgroups within theater. This allows a better comparison of the Census data for theater organizations than was possible for opera, orchestra, or dance groups.

One other source for theater data was examined, the American Theater Association (ATA) Directory.[16] ATA had no expenditure data; however, a count of its membership directory showed approximately 220 theaters not affiliated with a college or university (but including military installations, festivals, associations, and puppet theaters). Approximately 540 theaters of colleges, universities, and arts schools were also found, producing a total of about 760 organizations.

Figure 3-20 compares data from these six sources. The Ford Foundation, TCG, and Seligson data include only larger professional resident companies; the other data portrays a larger universe. The MATHTECH universe includes all theater activity in the United States. Figure 3-21 shows average budget sizes for most years. For TCG and MATHTECH data, the largest theaters (TCG "Core" and MATHTECH "Larger") are segregated to give some indication of groups in later years that are equivalent to Ford Foundation and Seligson data. Because the numbers of the organizations within these groups are neither held constant nor represent the universe, the averages cannot be used to measure growth in the organizations (or certain definable groups).

Since there is no universe data for early in the decade, the data sources were combined to account for as many organizations as possible. Duplication was eliminated. The results (and the theaters reporting to each source) are shown in Figures 3-22 and 3-23. These data include only larger (mostly over $100,000) theaters. The purpose of this exercise is to show that although the early data sources list similar numbers of theaters, that is more a coincidence than a reflection of the true number of larger theaters in existence at the time. Of the 49 theaters included in Figure 3-23, about half a dozen had either died or been reorganized into another institution by the end of the decade, but another half dozen or so were founded and had grown to $100,000 by 1974.

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[16] American Theater Association. Directory. 1981

THE THEATER DATA SETS

	Ford Foundation*		Theatre Communications Group**		Census Bureau		Other Single Year Studies***	
	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)
1970	32	$21,966	-	-	-	-	31	$19,077
1972	31	$28,830	—	—	440	$104,990	—	—
1974	31	$39,217	35	$ 29,575	—	—	—	—
1976	—	—	151	$ 77,280	—	—	1,028	$139,716
1977	—	—	153	$ 80,669	508	$156,379	5,545	$238,896
1979	—	—	157	$104,208	—	—	—	—
1980	—	—	147	$113,600	—	—	760	NA

*Published Ford data including 27 theaters at $19,643. Two theaters were not included in the unpublished data, while 7 were added. The combined total of the two (also see Figure 3-22 produces 34 Theaters at $23,430.

**TCG changed criteria for inclusion in 1976, lowering the minimum budget size from $200,000 to $25,000.

***1970 Data: Sureva Seligson survey for the National Endowment for the Arts
1976 Data: NRCA Study - universe is projected from sample survey.
1977 Data: MATHTECH Study - MATHTECH did not clearly segregate profit from nonprofit theaters. The number of organizations shown above represents our best estimate based on MATHTECH's detailed discussion. The dollar figure is also an estimate, based on information within the report and on Census and other data (also see Figure 3-30 documentation on our estimates).
1980 Data: American Theatre Association memberships - non-theaters are excluded.

FIGURE 3-20

COMPARISON OF THEATER UNIVERSES

Source and Year of Data	Number of Organizations	Total $ (000's)	Avg. $ (000's) Per Organization
1970			
Ford Foundation	32	$ 21,966	$ 686.4
Seligson - NEA	31	19,077	615.4
1972			
Ford Foundation	31	28,830	930.0
Census	440	140,990	238.6
1974			
Ford Foundation	31	39,217	1,265.1
TCG	35	29,575	845.0
1976			
TCG (Core)	49	44,296	904.0
TCG (All)	151	77,280	511.8
NRCA	1,028	139,716	135.9
1977			
TCG (Core)	44	47,158	1,071.8
TCG (All)	153	80,669	527.2
Census	508	156,379	307.8
MATHTECH: "Larger"	59	61,404	1,040.7
MATHTECH: "Independent"*	795	193,046	242.8
MATHTECH: All*	5,545	238,896	43.1
1979			
TCG (Core)	48	74,196	1,545.7
TCG (All)	157	104,208	663.7
1980			
TCG (All)**	147	113,600	772.8

*The total dollar figures are estimates based on information within the MATHTECH Report. (Also see Figure 3-31.)

**In 1980, TCG no longer reported on their "core" group. Rather, figures were given for the 30 largest and 30 smaller theaters.

FIGURE 3-21

COMBINED DATA ON LARGER RESIDENT THEATERS

	Ford Foundation Published Data		Ford Foundation Unpublished Data		NEA-Seligson Data		TCG Data*		Combined**	
	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)
1970	27	$19,343	32	$21,966	31	$19,007	—	—	41	$24,657
	Combined Ford: 34 at $23,430									
1974	—	—	[illegible]	$39,217	—	—	35	$29,575	39	$43,466
1976	—	—	—	—	—	—	49	44,296	—	—
1977	—	—	—	—	—	—	44	47,158	—	—
1979	—	—	—	—	—	—	48	74,196	—	—

See Figure 3-23 showing which theaters are included. Although not all theaters were over $100,000 at the beginning of the decade, those that did not disappear (i.e., 5 theaters that went out of business or reorganized) during the decade were all over $100,000 by the end of the decade. In fact, all 48 TCG theaters in their "core" group were over $350,000 in 1979.

*From 1976 on, these figures represent TCG's "core" theaters.

**With individual organization data, we were able to add data sets together in 1970 and 1974, eliminating all duplicate organizations.

FIGURE 3-22

THEATERS PARTICIPATING IN DATA SURVEYS

Theaters	NEA Seligson 1970	Ford Published 1970	Ford Unpublished 1974	T.C.G. 1974
* A Contemporary Theatre, Seattle			x	x
* The Acting Company, New York			x	x
Actors Theatre of Louisville	x	x	x	
Alley Theatre, Houston	x	x	x	
Alliance Theatre, Atlanta	x			x
* American Conservatory Theatre, San Francisco	x	x	x	x
American Place Theater, New York				x
American Shakespeare Festival, Stratford, CT	x	x	x	x
* Arena Stage, Washington, D.C.	x	x	x	x
* Asolo State Theater, Sarasota, FL		x	x	x
* Barter Theatre, Abingdon, VA	x	x	x	x
California Shakespeare Festival, Los Gatos, CA	x			
Center Stage, Baltimore	x	x	x	x
Charles Playhouse, Boston	x			
Chelsea Theater Center, Brooklyn			x	x
Cincinnati Playhouse in the Park	x	x		x
* Circle in the Square, New York			x	x
* Cleveland Play House	x	x	x	x
Dallas Theater Center				x
Folger Theatre Group, Washington, D.C.			x	
* Goodman Theatre	x	x		x
Great Lakes Shakespeare Festival, Lakewood, OH	x			
* The Guthrie Theater, Minneapolis	x	x	x	x
* Hartford Stage Company	x	x	x	x
Inner City Cultural Center, Los Angeles, CA	x			
* Indiana Repertory Theatre, Indianapolis			x	x
* Long Wharf Theatre, New Haven	x	x	x	x
* Loretto-Hilton Repertory Theatre, St. Louis			x	x
* Mark Taper Forum, Los Angeles	x	x	x	x
* McCarter Theatre, Princeton			x	x
* Meadow Brook Theatre, Rochester, Michigan		x		x
* Milwaukee Repertory Theater Company	x	x	x	x
Mummers Theatre, Oklahoma City	x	x		
Negro Ensemble Company, New York	x			
New Orleans Repertory Theater	x	x		
* New York Shakespeare Festival			x	
Old Globe Theatre, San Diego	x			x
* Phoenix Theatre, New York			x	x
Rochester Shakespeare Theatre				x
Repertory Theatre of Lincoln Center	x	x	x	
* Seattle Repertory Theatre	x	x	x	x
* Stage/West, Springfield, MA	x	x	x	x
* Studio Arena Theatre, Buffalo	x	x	x	x
Syracuse Stage				x
Theatre Company of Boston	x	x		
* Trinity Square Repertory Company, Providence	x	x	x	x
Virginia Museum Theatre Repertory Co., Richmond			x	x
Washington Theater Club, Washington, D.C.	x	x		
* Yale Repertory Theatre, New Haven		x	x	x
TOTALS 49 Theaters	31	27	31	35

*25 Theaters referenced in Figure 3-24.

FIGURE 3-23

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As with the opera and orchestra data, it would be valuable to know how the growth of theater has been affected by inflation. That is, how many $100,000 theaters existed in 1970 versus how many $205,000 (or the approximate) theaters existed in 1980. Neither number is available in the data, but an analogous comparison of most of the largest resident theaters can be made. As indicated in the separate chapter on theater (Chapter 7), TCG supplied figures for 29 theaters grouped by budget size. All 29 theaters were over $500,000 in 1980, and their combined budget was $52.074 million, or $25.402 million in 1970 dollars.

An equivalent budget size for 1970 would be $243,902, slightly under $250,000. Therefore, determining the number of theaters with budgets below $243,902 would provide another picture of growth ($250,000 to $500,000 organizations instead of the $100,000 to $200,000 growth determined for opera groups). Five theaters had to be eliminated because budget size data for 1970 were not available. One very large theater was added because its size for both 1970 and 1980 was known. Of this group of 25 theaters, 19 were found to be over the $243,902 mark in 1970. Thus, six additional theaters joined the largest theater ranks (three of which were founded between 1970 and 1972).

The stratification by budget size for the two ends of the decade is shown in Figure 3-24. Without individual data, a total budget figure for the 25 theaters cannot be calculated and then deflated to 1970 dollars to provide a measure of real growth. However, the number of theaters with high budget sizes in 1980 shows substantial real growth of the decade.

TCG has produced a written report on its annual survey since the mid-seventies. In 1979, the report gave data on the age of the 157 companies from whom TCG collected data. Figures 3-25 and 3-26 present this data and a graph of the data. The resulting picture is that (resident) theater companies are a newer organizational art form than opera companies or orchestras. About 75 percent of the theaters (still in operation) were founded after 1965.

To determine the universe of theater organizations and the total dollar size of those organizations, the MATHTECH data alone does not suffice. However, by juxtaposing the U.S. Census data against the MATHTECH data, an imputation of the dollar size of the universe can be made. Figure 3-27 shows a breakout of both the

25 LARGEST RESIDENT THEATERS BY BUDGET SIZE 1970 AND 1980

Budget Size	Number of Theaters	
	1970	1980
$0 - $250,000	6	—
$250,001 - $500,000	5	—
$500,001 - $1 Million	10	5
$1 Million - $2 Million	3	12
Over -$2 Million	1	8
	25	25

These 25 theaters were all included both in Ford Foundation 1970 data and in TCG 1980 data, except for one very large theater that was not included in TCG data, but whose budget size was known. Names of these theaters are starred in Figure 3-23.

FIGURE 3-24

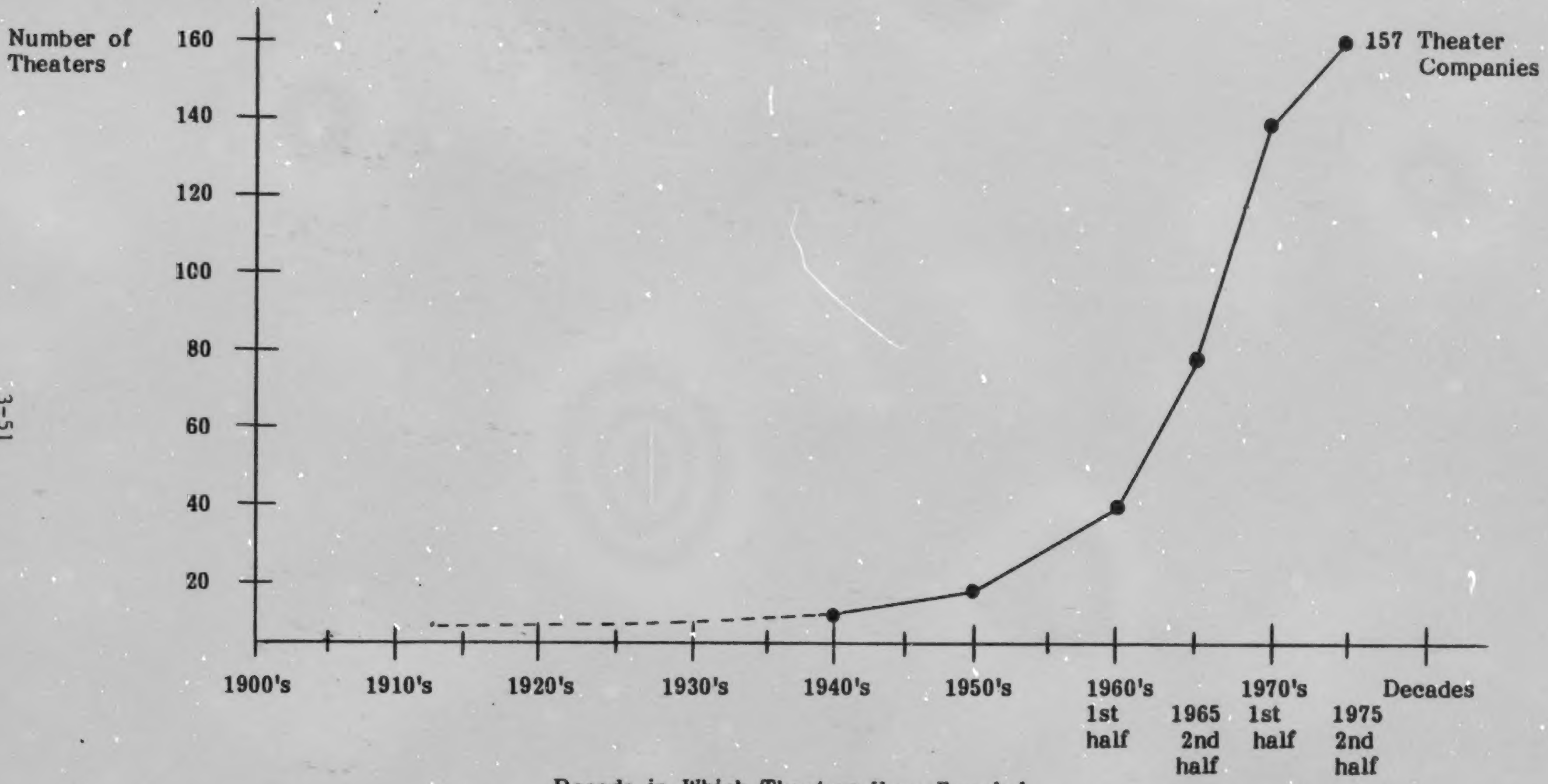
AGE OF THEATER COMPANIES

Years in Which Theater was Founded	Number of Theaters
1975 - 1977	18
1970 - 1974	57
1965 - 1969	42
1960 - 1964	21
1950 - 1959	11
Pre-1950	8
	157

*Source of Data: TCG Survey 1979, p. 11.
One Theater goes as far back as 1915.

FIGURE 3-25

NUMBER OF THEATER COMPANIES IN OPERATION
(AGE OF THEATER)



Decade in Which Theaters Were Founded
Source of Data: TCG Survey 1979, p. 11 - See Figure 3-25.

FIGURE 3-26

ECONOMIC CENSUS - TAX EXEMPT ESTABLISHMENTS IN CODE 7922 "PRODUCERS OF LEGITIMATE THEATER"

	1972		1977	
Census Categories	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)
Resident Theater	52	$ 29,980	44	$ 34,943
Stock Theater	20	3,477	29	11,621
NY (B'way) Productions or Road Shows	15	21,343	9	44,937
Off B'way Productions	not asked		8	1,414
Off-Off B'way Productions	not asked		18	1,925
Children's Theater (called Children's Shows: 1972)	12	568	41	4,254
Dinner Theater	0	0	2	(D)*approx. 1,200
Community Theater (called "Little" Theater: 1972)	86	4,214	159	13,486
Industrial Shows	0	0	not asked	
Other Shows	15	4,107	not asked	
Other Theatrical Productions	240	41,301	28	5,307
Not Appropriately Self-Designated (NAS-D)	___	not used**	170	(D) approx. 37,292
TOTAL Code 7922 Establishments:	440	$104,990	508	$156,379

*(D) = Not disclosed by the Census Bureau. The approximations were calculated by using an average slightly below the taxable establishment average for dinner theater and allocating the dollars not accounted for in the total to the 170 NAS-D establishments.

**In 1972, NAS-D was not used; rather all NAS-D responses were classified with true "other theatrical productions."

FIGURE 3-27

1972 and 1977 Economic Census figures for theater (SIC code 7922). Because the theater categories are not the same in both censuses, no direct comparison of the data can be made. For instance, from all the other data available on resident theater, one would expect the number of organizations to grow from 1972 to 1977 rather than decrease. One possible (and very probable) explanation is a change in the category checked (or an error) by the respondent, for example, from "Resident" in 1972 to "Off-Off Broadway" or "Not Appropri[illegible]elf-Designated" in 1977.

Figures 3-28 and 3-29 show the universe numbers as developed by MATHTECH along with some other interesting measures: capacity, number of productions and performances, and total audience size. Figure 3-30 shows our allocation of organizations into either taxable (profit) or tax-exempt (nonprofit) status. Our allocation was based on the discussion in the text of the MATHTECH report and, where necessary, was supplemented by percentages of like organizations identified in the Census data whose total expenses were calculated. MATHTECH developed its universe by examining a large number of data sources, eliminating any duplication where found, and using those knowledgeable in the theater field to provide estimates where no data existed. Therefore, their numbers of organizations, although seemingly large, are as comprehensive as any count in the arts. In relation to the 779 opera companies reported by COS (Figure 3-16) and the 1,500 orchestras estimated by ASOL (Figure 3-8), 5,545 theaters does seem to be an abnormally large number. NRCA in its universe of all arts organizations projected 495 symphony orchestras, 200 operas, and 1,028 theaters. More questionable are the numbers given in the MATHTECH report as estimates for community and college theaters. Whereas in the opera and orchestra disciplines, the data/estimates tended to be conservative, in theater, the estimate may be on the liberal side.

Figure 3-31 is a worksheet showing our imputation of the dollar size of the universe of nonprofit theaters. For opera and orchestra, ranges of dollar size were used to make the imputations. Since the majority of the dollar figures are imputed, we have used a single number instead of a range. When a subtotal for a certain category of theaters is generated, an approximation is given rather than a range. In fact, the theater data are based much more on estimation than the two previous disciplines were, and therefore, could easily be in error by plus or minus 25 percent or more.

Regional distribution of theatre facilities and companies 1977

Region	Broad-way	Road	Dinner Equity	Dinner non-Equity	Summer Equity	Summer non-Equity	Outdoor	Outdoor fest-ivals	LORT	Black & Chi-cano	Small thea-tres
Middle Atlantic											
New Jersey	--	9	--	6	2	6	1	--	2	1	7
New York State (excluding New York City)	--	18	5	2	[illegible]	25	2	--	5	8	21
Pennsylvania	--	20	2	4	8	18	3	--	2	3	14
New York City	39	--	--	--	--	--	1	--	7	27	230
Northeast											
Connecticut	--	6	2	3	5	7	2	--	6	5	9
Maine	--	--	--	1	3	2	--	--	1	--	4
Massachusetts	--	4	3	1	6	15	4	--	1	2	17
New Hampshire	--	--	--	--	5	7	--	1	2	--	1
Rhode Island	--	2	1	--	--	2	1	--	1	--	3
Vermont	--	1	--	--	1	6	--	--	--	--	1
W. North Central											
Iowa	--	7	--	--	--	4	--	--	--	1	3
Kansas	--	7	--	--	--	5	--	--	--	1	2
Minnesota	--	6	3	--	--	7	--	1	2	1	11
Missouri	--	8	4	2	1	4	2	1	2	1	2
Nebraska	--	3	2	--	--	2	--	--	--	--	4
N. Dakota	--	1	--	--	--	2	--	--	--	--	1
S. Dakota	--	--	--	--	--	6	--	1	--	--	1
South Atlantic											
Delaware	--	1	--	--	--	1	--	--	--	--	3
Washington, DC	--	3	--	--	--	4	1	--	2	7	13
Florida	--	15	6	3	3	3	1	1	1	6	12
Georgia	--	6	1	1	--	2	1	--	1	4	10
Maryland	--	2	4	3	--	3	1	1	1	1	9
N. Carolina	--	12	2	3	2	6	--	10	2	3	8
S. Carolina	--	3	--	--	--	3	--	1	--	--	4
Virginia	--	7	2	9	1	4	--	3	2	--	3
W. Virginia	--	4	--	1	--	2	--	1	--	--	2
E. North Central											
Illinois	--	14	3	--	8	10	--	1	3	3	51
Indiana	--	11	2	3	--	11	2	--	1	1	1
Michigan	--	9	--	--	3	10	1	--	1	3	7
Ohio	--	12	5	2	--	11	3	4	3	1	4
Wisconsin	--	13	--	--	2	4	7	2	1	1	6
W. South Central											
Arkansas	--	3	--	1	--	--	--	3	--	1	3
Louisiana	--	6	1	1	--	1	--	1	--	4	6
Oklahoma	--	5	1	--	--	2	--	3	--	--	5
Texas	--	19	6	3	--	4	2	5	3	3	11
Mountain											
Arizona	--	5	1	1	--	--	--	--	1	--	8
Colorado	--	6	1	4	1	11	--	--	--	--	4
Idaho	--	1	--	--	--	2	--	--	--	--	3
Montana	--	--	--	--	--	5	--	--	--	--	1
Nevada	--	--	--	--	1	--	--	--	--	--	--
New Mexico	--	3	2	--	--	1	--	--	--	--	9
Utah	--	4	2	--	--	1	--	2	--	--	2
Wyoming	--	--	--	--	--	2	--	--	--	--	--
E. South Central											
Alabama	--	5	--	1	--	1	--	--	--	1	4
Kentucky	--	4	1	1	--	5	--	5	1	--	4
Mississippi	--	2	--	--	1	--	--	--	--	1	2
Tennessee	--	9	--	3	--	2	--	2	1	1	7
Pacific											
Alaska	--	--	--	--	--	--	--	1	1	--	--
California	--	27	4	2	--	15	1	2	6	13	66
Hawaii	--	--	--	--	1	--	--	--	--	--	6
Oregon	--	1	--	--	--	3	--	--	--	--	4
Washington	--	5	1	--	--	1	--	1	3	3	10
Puerto Rico	--	--	--	--	--	--	--	1	--	--	--
Totals	39	309	67	61	63	247	30	53	65	107	620
States	1	43	32		48		17	23	28	27	48

National Endowment for the Arts. Research. Report No. 11, Table 1, p. 16.

FIGURE 3-28

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Attendance by theatre type 1976-77

	Facilities	Capacity (seats)	Productions	Performances	Attendance (millions)
Broadway	39	49,000	63	10,800	8.8
Road	309	700,000	---	9,000	14.7
Dinner	128	45,000	1,300	32,000	11.1
Large musical arenas and hardtops	30	99,000	200	3,000	6.6
Small summer stock	310	100,000	1,200	22,000	4.9
Outdoor	40	---	40	2,000	1.7
LORT	65	38,400	396	13,200	6.0
Nonprofit touring	---	---	---	3,000	1.4
Other small budget	620	---	---	---	8.6
Total	1,541	1,031,400	3,199	95,000	63.8
Community	2,500	---	7,500	45,000	6.7
College	2,500	---	7,500	30,000	9.0
High school	30,000	---	30,000	150,000	45.0
Total	35,000	---	45,000	225,000	60.7

National Endowment for the Arts. Research. Report No. 11, Table 2, p. 22.

FIGURE 3-29

COMPARISON OF TYPES OF THEATER IN THE MATHTECH UNIVERSE AND 1977 CENSUS OF SERVICE INDUSTRIES

MATHTECH Category	Total Reported By MATHTECH		Total Reported by Census Taxable (Profit)	Tax Exempt (Nonprofit)	Difference Between MATHTECH and Census
LORT/Larger Resident	65	(1)	—	65	—
Road	309	(2)	30	9	309
B'Way	39	(3)			
Dinner Theater	128	(4)	126	2	—
Summer Stock	310	(5)	85	85	140
Large Outdoor Tent and Hardtop Musicals	30	(6)	18	6	6
Outdoor Festivals/Pageants	53	(7)	25	28	—
Small Theaters Black & Chicano)	620	(8)	20	600	—
SUBTOTAL	1,554		304	795	455
Community	2,500	(9)	250	2,250	—
College	2,500		—	2,500	—
TOTAL	6,554		554	5,545	455

(1) All theaters with Actors Equity Association contacts plus Dallas Theatre Center.

(2) All are facilities and/or sponsors.

(3) MATHTECH suggests all are profit; Census found 9 tax exempt in combined category.

(4) MATHTECH suggests all are profit; Census found 2 tax exempt.

(5) MATHTECH found 140 colleges that sponsored paid summer stock (these are not included) and could not identify the tax status of 41. 65 were identified as profit, and 64 as nonprofit. Of these 41, half are allocated to nonprofit. Also see (7).

(6) Six of these are sponsors: "huge midwestern municipal theaters

(7) MATHTECH reports 53 whose tax status is not known. We combined these with the 41 unknown from (5) to compare with the equivalent Census category of "Other Theatrical Productions" which is 52% nonprofit. Therefore, we split the unknowns as 48% profit and 52% nonprofit.

(8) In this group, MATHTECH includes 30 Off-Broadway Theaters in New York City. They suggest all are profit, while Census finds almost half to be nonprofit. We allocate one-third (10 theaters) to nonprofit. MATHTECH found 28 Off-Boradway Theaters which both they and Census agree are all nonprofit. The other theaters are also nonprofit.

(9) MATHTECH says nothing about tax exempt status. Since Census shows 90% to be nonprofit, we allocate 90% to nonprofit.

FIGURE 3-30

IMPUTATION OF TOTAL DOLLARS - NONPROFIT THEATER UNIVERSE

Category	Notes	Number of Organizations	Total $ (000's)	Avg. $ (000's) Per Organization
Larger Nonprofit Theaters (LORT)	MATHETCH Reported	59	$61,404	$1,040.7
	Within this group are the very largest theaters including N.Y. Shakespeare Festival at approximately $9 Million. Without New York Shakespeare, the average falls to $903.5. We prefer to use the Census average of approximately $800,000 per organization.	6	4,800	800.0
		65	$66,204	
Broadway and Road	Census reported.	9	44,937	4,993.0
Developmental Smaller Theaters (includes Off-Broadway and Off-Off-Broadway	Census average for 9 Off-Broadway. . . . Theaters is 176.8	10	1,750	175.0
	MATHTECH reported	113	11,502	101.8
	For the other 477, we use a combination of the analogous Census categories: Community 150: avg. = 84.8 Children's 41: avg. = 103.7 Off Off-B'way 18: avg. = 106.9 but reduce it because Census tends to have larger organizations. . . .	477	35,775	75.0
		600	$49,027	
	SUBTOTAL	674	$160,168,000	

TOTAL: "Serious/Professional" Theater
approximately 675 Theaters at $160 Million.
Note: TCG estimates that there are approximately 300 theaters (total $ size = $116,600,000) that are professional and large enough to be a possible constituent Theater of TCG.

FIGURE 3-31
(Page 1 of 3)

IMPUTATION OF DOLLARS - NONPROFIT THEATER UNIVERSE

Category	Notes	Number of Organizations	Total $ (000's)	Avg. $ (000's) Per Organization
Dinner Theater	Census Reported 2 Theaters We imputed dollars at approximately the profit establishment size	2	$1,200	600.0
Summer/Stock	Census Reported	29	11,621	400.7
	We imputed the others at $250,000 average, about 65% of the Census average because larger organizations are included in Census figures	56	14,000	250.0
		85	$25,621	
Large Outdoor/ Musicals and Outdoor Festivals/Pageants	Census Reported	28	$5,307	189.5
	We imputed the other 6 at $125,000	6	750	125.0
		34	$6,057	
	SUBTOTAL	795	$193,046,000	

TOTAL: "Independent/Paid" Theater
approximately 800 Theaters at $200 Million

FIGURE 3-31
(Page 2 of 3)

IMPUTATION OF DOLLARS - NONPROFIT THEATER UNIVERSE

Category	Notes	Number of Organizations	Total $ (000's)	Avg. $ (000's) Per Organization
Community	These are the community and avocational theaters reported by MATHTECH, not the smaller theaters which Census has under community	2,250	$11,250	5.0
	SUBTOTAL	3,045	$204,296,000	

TOTAL: Theater Companies/Groups approximately 3,000 at $200 Million

Category	Notes	Number of Organizations	Total $ (000's)	Avg. $ (000's) Per Organization
College/University	MATHTECH Reports 140 who do paid Summer Stock, which we impute at $50,000	140	$7,000	50.0
	American Theater Association has a College/University membership of about 540 (an additional 400) which we imputed at $20,000	400	8,000	20.0
	We imputed the other 1,960 at $10,000. .	1,960	19,600	10.0
		2,500	34,600,000	
	TOTAL	5,545	$238,896,000	

TOTAL: All Nonprofit Theater Companies/Groups/Workshops* approximately 5,500 at $240 Million.

*This excludes high school theater and organizations that are primarily theatrical facilities.

FIGURE 3-31
(Page 3 of 3)

There is no feasible way to estimate the size of the theater universe in 1980 or to project from the 1977 data. The estimate of about 5,500 theaters in 1977 at approximately $240 million is the only one available. The number of "serious/professional" theaters can be put at 675 at $160 million. TCG estimates the number of "professional theaters" (in 1980/1981) at about 350, of which 200 are TCG members. The 350 represents those theaters that are eligible to be TCG members.

Although growth over the decade cannot be measured, the data presented here imply significant growth. Chapter 7 presents an analysis over the decade on 18 larger resident theaters and on 29 theaters for the second half of the decade.

MUSICAL THEATER

In our classification scheme (see Chapter 2), musical theater is a separate type of organization. However, musical theater is difficult to separate as a unique group of organizations. Musical theater is part of the Opera/Musical Theater Program at the National Endowment for the Arts and was included as part of the census activities of the National Opera Institute (see Opera section for discussion of the NOI census). However, much of musical theater is presented or produced by theater organizations that are members of the TCG constituency. Musical theater is obviously included by MATHTECH (one of its categories being "Large outdoor tent and hardtop musicals"), and most likely is under theater in both the Census data and the NRCA study. Thus, the overlap of musical theater with other disciplines seems complete.

Within the theater universe, a digression into musical theater can be made. Since individual organization data were made available from the National Opera Institute (NOI) census and the criteria for inclusion was production of a fully staged work in each of the last three (for a small group of organizations, two) years (see Appendix A), some analysis on musical theater is possible.

NOI found 71 musical theaters that gave about 5,200 performances in 1977 and had an aggregate total dollar size of $64.38 million. Since the census included opera as a separate category, no overlap problem with opera exists in the data. However, overlap does occur with theater. As Figure 3-32 shows, of the 71 NOI organizaions, 40 (56 percent) were members of TCG for that year

MUSICAL THEATER

NOI Universe (1977)	71	Organizations
Members of TCG	40	
	31	
Organizations presenting performances other than Musical Theater	14	
	17	
	16	Reported $9,750,997 (1 reported no figures) Average = $609,437 Without the Civic Light Opera of Los Angeles., the average drops to $250,000 The Median = $100,000

FIGURE 3-32

(1977). The 40 organizations represent over 75 percent of the total dollar amount of the musical theater universe (one theater had a budget of over $30 million). As a comparison, Central Opera Service reported 63 nonprofit theaters in its "organizations producing opera" universe (see Figure 3-12). Of the 31 NOI musical theater organizations that are not TCG members, only 17 gave performances that were exclusively musical theater and not another performing arts discipline.

Since so many of the NOI organizations are counted in other disciplines, it is meaningless to generate a total dollar figure. However, of the 17 "non-TCG musical theater performances only" organizations in NOI data, 16 reported a total dollar size of $9.751 million, and with an estimate of the 17th organization, the total dollar size is approximately $10 million.

NOI data also provides a veiw of the age of organizations. These 17 musical theaters seem to range in age as the theater group did (see Figures 3-25 and 3-26). Three have been in continuous operation since before 1940; all the rest began operations in the sixties (six theaters) or the seventies (eight theaters).

DANCE

As was true for the theater, a considerable amount of data on dance does exist. Although there are some counts at both the beginning and the end of the decade on various sets of dance companies, the data is not of sufficient consistency to be able to measure growth in the universe. Furthermore, in only one year, can dollar figures of the universe be calculated. Besides Ford Foundation data and Census Bureau data (both described in the early part of this chapter), two associations for dance companies, two dance directories, two single-year surveys, and our own sample of dance comapnies provide the data.

One association that provided figures for the early part of the decade is the now-defunct Association of American Dance Companies (AADC). A report[17] from AADC early in the decade provided membership counts for 1970 and 1972. In addition, in 1978 it published the American Dance Directory, which described 169 dance companies and provided a single total budget figure for those companies. The other association is the National Association of Regional Ballet (NARB), for whose membership we have two counts along with total dollar figures.

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[17] Association of American Dance Comapnies. The State of Dance in the United States. 1973.

Dance Magazine, a publication primarily for the dance world, in its annual issue lists dance companies from around the world, both profit and nonprofit. Dance Magazine produced this listing throughout the decade. However, since it did not distinguish profit from nonprofit companies, in-depth analysis on nonprofit companies was impossible.[18/]

No longitudinal data for the continuation of the Ford Foundation data base (such as TCG theater data and OPERA America data) were found. Therefore, as Chapter 8 presents, we developed a dance data base for measuring growth. Those data are also included here.

Figure 3-33 compares data from these nine sources. The Ford Foundation, Seligson, and seventies decade data cover only a select number of larger companies, many of which are located in New York City. NARB data cover an almost completely different group of companies. Figures 3-33 and 3-34, showing average budget size, also show that the Census, the NRCA, and the AADC directory data each include many smaller organizations. Additionally, it is highly likely that Census and NRCA are missing one or more of the largest companies; AADC states this to be the case. Figure 3-34 also breaks out the average budget size under Ballet and Modern Dance. The U.S. census data is problemmatic because of the large number of "Not Appropriately Self-Designated" (NAS-D) organizations and dollars in the dance category. Figure 3-2 shows the Census data. The 29 NAS-D and the four "Other" companies together account for almost $32 million, for an average of $1 million per organization.

The dance universe is made up of several categories of dance. Most of the data examined broke dance into two types: Ballet and Modern Dance (Modern Dance includes Ethnic, Folk and Jazz Dance, and other non-ballet companies). The

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[18/] Extensive analysis has been completed by Professor Lila Sussmann of the Sociology Department at Tufts University on the Dance Magazine annual listings. These data, however, have not been published and were not made available to us.

THE DANCE DATA SETS

	Ford Foundation and 70's Decade Study*		National Assoc. of Regional Ballet**		Census Bureau***		Other Single Year Data****	
	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)
1970	32	$13,612	—	—	—	—	20	$15,835
1972	18	17,947	—	—	13	2,938	480	?
1974	20	23,382	—	—	—	—	—	—
1975	15	25,989	93	$3,062	—	—	—	—
1976	15	31,233	—	—	—	—	290	60,248
1977	15	33,986	—	—	98	51,135	—	—
1978	15	36,793	—	—	—	—	162	37,000
1979	15	43,658	—	—	—	—	—	
1980	—	—	91	6,752	—	—	850	?

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* For 1970, published Ford Foundation data are used. The composition of ballet companies did not change, but 8 Modern Dance companies ($1,798,512) were in the published data, while only 4 remained in the unpublished data (at $861,927). The only logitudinal data available for the second half of the decade were on our own sample. Also see Chapter 8.

** Member companies responding to Association Survey.

*** The Census Bureau in 1972 listed 13 ballet companies and 1 "classical dance company" (in New York) whose expenditure figures were not disclosed. Modern folk and ethnic dance had no separate classification; the code that included them was "dance bands, orchestras, except symphony " That code had no profit/nonprofit breakout and included 3,016 establishments at $109,624,000 in receipts (not expenditures). See Figure 3-2 for 1977 Census classifications.

**** 1970 Data: Sureva Seligson Survey for the National Endowment for the Arts
1972 Data: Associaton of American Dance Companies membership as reported in The State of Dance in the United States, AADC, 1972. This figure is reported "up from 320 companies in 1970," p. 9.
1976 Data: NRCA Survey - universe is projected from sample survey.
1978 Data: American Dance Directory, published by the Association of American Dance Companies, p. V.
1980 Data: Approximate count of listings in Dance Magazine excluding non-U.S. companies and individuals. The data appear to include profit (taxable) organizations.

FIGURE 3-33

COMPARISON OF DANCE DATA SETS

Source and Year of Data	Number of Organizations	Total $ (000's)	Average $ (000's) Per Organization
1970			
Ford Foundation - Published (All)	17	$13,612	$ 800.7
Ballet	9	12,159	1,351.0
Modern Dance	8	1,453	181.6
Ford Foundation - Unpublished (All)	13	13,021	1,001.6
Ballet	9	12,159	1,351.0
Modern Dance	4	862	215.5
Seligson (All)*	20	15,835	791.7
1972			
Ford Foundation - Unpublished (All)	18	17,947	997.1
Ballet	11	16,269	1,479.0
Modern Dance	7	1,678	239.7
Census - Ballet only	13	2,938	226.0
1975			
70's Decade (All)	15	25,989	1,732.6
NARB	93	3,062	30.4
1976			
70's Decade (All)	15	31,233	2,082.2
Ballet	10	26,588	2,658.8
Modern Dance	5	4,645	929.0
NRCA	290	60,248	207.8
1977			
70's Decade (All)	15	33,986	2,265.7
Ballet	10	28,290	2,829.0
Modern Dance	5	5,696	1,139.2
Census (All w/o NAS-D)	65	19,182	295.1
Ballet	39	16,720	428.7
Modern and Ethnic/Folk	26	2,462	94.7
All with NAS-D	98	51,135	521.8
1978			
70's Decade (All)	15	36,793	2,452.8
Ballet	10	31,564	3,156.4
Modern Dance	5	5,230	1,046.0
AADC (All)	162	37,000	228.4

*Seligson data, as published, did not match worksheet figures. The published data (which did not break out ballet from modern dance) was a closer match to Ford than the raw figures. Therefore, we use it here.

FIGURE 3-34

distinction between the two was much clearer at the beginning of the decade than it was at the end. But even at the beginning of the decade, fluidity between the two was being felt. The Ford Foundation in 1973 described modern dance as being sometimes defined by contrasting it with classical ballet.

> The distinctions are not rigid, however, since many modern dancers have had balletic training, and many artistic directors of ballet companies use choreographers identified with the modern dance. Often, in these meldings of modern dance with ballet, the point shoe customary in ballet is discarded, just as it is in some other choreographic works that would automatically be called "ballets."[19]

At the end of the decade, Dance Magazine qualified its categorization of ballet companies as follows:

> While each of the companies listed below might, for the moment, generically be characterized as a ballet company, in a few instances the cagegory was arbitrary as the lines of demarcation between what constitutes a ballet company and a modern dance company became increasingly less distinct. Few companies today limit their repertory exclusively to traditional classical and romantic ballets. Some perform contemporary work in the ballet idiom exclusively, and the works of modern dance choreographers are now also being incorporated into the repertoire of many ballet companies. Indeed, a few companies may be said to be equally at home in both techniques.[20]

If the category that is being examined is dance companies, this difficulty in differentiation does not matter, but if separate types of dance companies are being analyzed, clear differentiation is important. Furthermore, there is a structural difference between ballet companies and most other types of dance groups. Ballet companies require a minimum troupe of 15 to 20 dancers in order to perform the traditional and romantic repertory, whereas much modern repertory requires only a small number of dancers. The impact of repertory on budget size is significant--ballet companies are structurally larger.

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[19] The Ford Foundation, op cit. p. 18.

[20] Dance Magazine. Annual. 1982, p. 14.

Of the data series in which individual organization data were available, Figure 3-35 shows which dance companies were included. As in the theater discussion, none of the data available count the universe of larger (over $100,000) companies, but rather make specific, somewhat arbitrary groupings. A few of the 28 companies on this listing are below $100,000 for early years; some no longer exist (either they have gone out of business or have been reorganized into another company; this is especially true for modern dance companies which tend to exist at the creative discretion of the choreographer.) As Dance Magazine states, "Just as these companies vary in stability and continuity, so do they vary in quality, in their geographic availability, in the scope of their aspirations, and the scope of their repertoire" (p. 14).

Figure 3-36 provides a comparison of budget size for 15 dance companies between 1970 and 1979. Unlike the opera and orchestra universes where the $100,000 organizations and the dollars are known, in dance the only growth we can observe is in this group of 15 larger companies. The top half of Figure 3-36 shows the upward shift in the budget size of these 15 companies. In 1970 no modern dance company was above $500,000 and only four ballet companies were above $1 million. In 1979, all modern dance companies were above $500,000 (some above $1 million) and all 10 ballet companies were above $1 million. The bottom half of Figure 3-36 lists the increases in the budget size of all 15 companies. In 1979 the budgets of the 10 ballet companies had increased between 2.1 and 10.9 times their 1970 budgets. A figure in the 2.0 and 2.5 range translates into growth that is just barely ahead of the rate of inflation. Three ballet companies, therefore, showed almost no real growth. Of the small sample of modern dance companies, all companies grew at a rate at least twice as great as inflation alone, thus showing significant real growth. Even if the wide variation from one year to another exhibited by two companies is eliminated by roughly averaging the budget size from year to year, the growth in these companies still exceeds inflation. The approximation for the one ballet company is necessary because a total expense figure for 1970 was not reported in the Ford Foundation, but was estimated for that year by the current administration of the company.

Figures 3-37 through 3-41 are the calculations of the universe of dance companies, their total dollars, and the age of these companies. The universe of "serious/professional" companies was put together from the listing of companies in the AADC Dance Directory (1978 data), data from this seventies decade study, and

DANCE COMPANIES PARTICIPATING IN DATA SURVEYS

Dance Companies*		NEA Seligson 1970	Ford Published 1970, 1971	Ford Unpublished 1972 - 1974	70's Decade Study 1975 on
Alvin Ailey American Dance Theater		x	x	x	x
Alwin Nikolais Dance Theater		x	x		
American Ballet Company/Feld		x			
American Ballet Theatre		x	x	x	x
Ballet West (Salt Lake City)		x	x	x	x
Bella Lewitzky Dance Company (L.A.)				x	
Boston Ballet		x	x	x	x
Dance Theatre of Harlem		x			
Erick Hawkins Dance Company			x		
Harkness Ballet		x			
Hartford Ballet Company				x	x
Houston Ballet		x	x	x	x
Joffrey Ballet		x	x	x	x
Jose Greco Foundation for Hispanic Dance				x	
Jose Limon Dance Company				x	
Martha Graham Center of Contemporary Dance		x	x	x	x
Merce Cunningham Dance Company		x	x	x	x
Minnesota Dance Theater (Minneapolis)		x			
Murray Louis Dance Company		x	x		
National Ballet (Washington, DC)		x	x	x	
New York City Ballet		x	x	x	x
North Carolina Dance Theatre				x	
Paul Taylor Dance Company		x	x	x	x
Pennsylvania Ballet (Philadelphia)		x	x	x	x
Pittsburgh Ballet Theatre				x	x
Repertory Dance Theatre (Salt Lake City)		x	x		
San Francisco Ballet Company		x	x	x	x
Twyla Tharp Dance Foundation		—	—	x	x
TOTALS****	28 Companies	20	17	20**	15
	Combined:	21 at $15,840***			

*All companies, either whose title does not give its location or whose location is not noted, are New York companies.

**One ballet and one modern dance company reported no expenditures until 1973.

*** Seligson had lower figures for 4 ballet companies, off-setting the addition of one modern dance company from the Ford Foundation. The Ford Foundation data were more closely scrutinized and thus, are probably more reliable.

**** In addition to these companies, 6 others were identified as being over $100,000 in the State of Dance in the United States. They were Dance Repertory Company (NYC), Atlanta Ballet, Chicago Ballet, Cincinnati Ballet, Niagra Falls Ballet (Buffalo), and American Folk Ballet (Los Angeles).

FIGURE 3-35

15 LARGER DANCE COMPANIES BY BUDGET SIZE
1970 AND 1979

Budget Size	Number of Dance Companies 1970	1979
$0 - $250,000	7	—
$250,001 - $500,000	1	—
$500,001 - $1 Million	3	3
$1 Million - $2 Million	1	4
$2 Million - $4 Million	3	4
Over -$4 Million	—	4
	15	15

Number of Times' Increase in Budget Size (1 = 100%)*
From 1970 to 1979

10 Ballet Companies		5 Modern Dance Companies
2.1	3.8	4.0 (approx)
2.2	4.1	4.7
2.2	5.7	7.0 (approx)
2.9 (approx)	9.7	11.5
3.2	10.9	20.0+ (2nd half of decade = 3.2)

*Calculation made by dividing 1979 budget by 1970 budget to see how many times the budget size increases. The "?" figures are companies with widely varying data. The figures shown in parentheses are with the variation minimized.

These 15 dance companeis were in both the Ford 1970 data and in the 70's Decade data.

In 1970 all 5 modern dance companies were below $500,000; in 1979, all were above $500,000. In 1970, 6 of 10 ballet companies were below $1 million; and in 1979, all 10 were above $1 million.

FIGURE 3-36

CALCULATION OF NUMBER OF "SERIOUS/PROFESSIONAL" DANCE COMPANIES
Combination of Data Sources, Circa 1978

	AADC All Companies	70's Decade All Companies	70's Decade Non-duplicate Companies	NARB All Companies	NARB Non-duplicate Companies	Total Non-duplicate Companies
Ballet Companies	34	10	2	89	84	120
Modern/Ethnic/Jazz Etc. Companies	135	5	–	8	6	141
TOTAL OF DATA SOURCE	169	15		97		
TOTAL NON-DUPLICATE CO.	169		2		90	261

Includes only those companies that appeared in AADC's American Dance Directory 1979-80, this 1970's Decade Study, and/or were members of the National Association of Regional Ballet.

Differentiation between Ballet and Modern, etc. becomes increasingly difficult through the Seventies Decade. Organizations that had "Ballet" in the title and presented some, but not necessarily only traditional ballets, were put into the ballet category. Modern, etc. companies presented no traditional ballets.

FIGURE 3-37

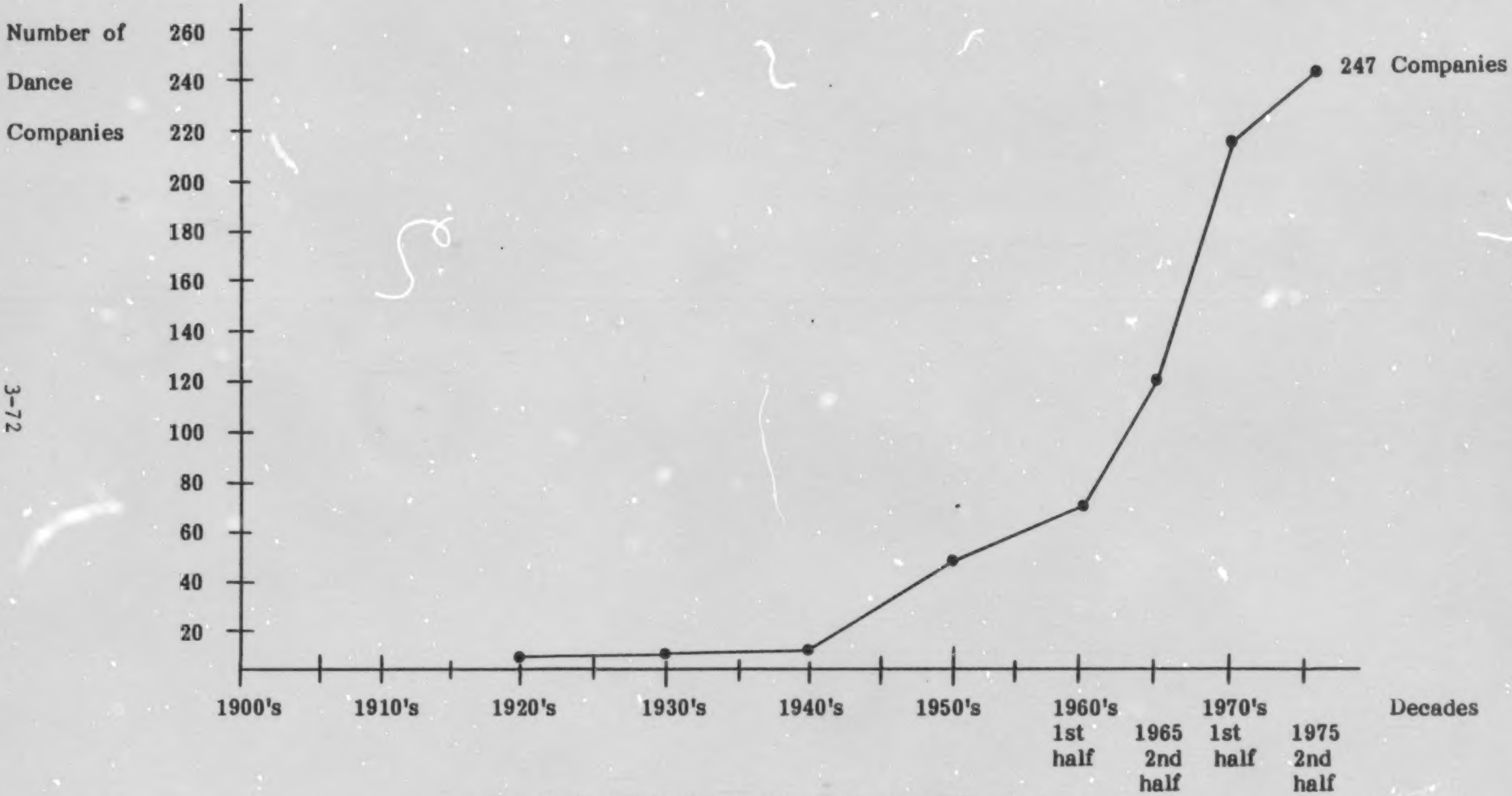
AGE OF DANCE COMPANIES

Years in Which Dance Company was Founded	Number of Dance Companies
1975 - 1977	30
1970 - 1974	94
1965 - 1969	45
1960 - 1964	29
1950 - 1959	38
Pre-1950	11
	247

Founding dates from AADC, 70s Decade and NARB data. Of the 261 dance companies (shown in Figure 3-37), 14 NARB companies did not show founding date.

FIGURE 3-38

NUMBER OF DANCE COMPANIES IN OPERATION
(AGE OF DANCE)



Decade in which Dance Companies were founded
Source of Data: AADC, 70's Decade and NARB - See Figure 3-38

FIGURE 3-39

CATEGORIES AND NUMBERS OF DANCE COMPANIES*
DANCE MAGAZINE ANNUAL 1982

Ballet Companies	316
Children's Dance Theater	19
Ethnic, Folk and National Dance Companies	81
Historical Dance Companies	15
Jazz Dance Companies	26
Mime Companies	38
Modern Dance Companies	334
Tap Dance Companies	8
Special Attractions	30
TOTAL	867

*Excludes non-U.S. Companies, individuals
Includes profit organizations, avocational and college groups

Represents companies in operation in 1980/1981.

FIGURE 3-40

ESTIMATE OF TOTAL BUDGET SIZE OF DANCE COMPANIES - 1978

	Reported Figures		Imputed Figures		
Sources	Number of Organizations	Total $ (000's)	Number of Organizations	Total $ (000's)	Avg. $ (000's) Per Organization
AADC - American Dance Directory	169	$37,000			
2 Other Large Companies From 70's Decade Study	2	12,223			
NARB Companies Not Included Above	—	—	90	$3,600 - 6,750	40 - 75
	171	$49,223	90	$3,600 - 6,750	

TOTAL "Serious/Professional" Companies
261 Companies at $52,823,000-$55,973,000

Of the Approximately 500 Companies listed in Dance Magazine 1978, the Number of Additional Nonprofit Companies Not Listed Above (rough estimate): 100 - 200 Companies at $500 - $4,000 Avg. 5 - 20

TOTAL Nonprofit Dance Companies 360 - 460 Companies at $53,000,000 - $60,000,000

FIGURE 3-41

the 1981 descriptions of members of NARB. Figure 3-37 shows a total count of 261 individual companies, divided into ballet and modern dance categories according to name of the company and the repertory listed in the description of the company in either the NARB or the AADC materials.

Figure 3-38 shows the years in which 247 of these companies were founded (14 of the 261 companies did not provide information on founding date). Figure 3-39 graphs these figures, visually reflecting the enormous growth in number of companies in the late sixties and early seventies. These numbers do not reflect companies that ceased operation, however.

Figure 3-40 presents the count of companies by category as calculated from Dance Magazine. The 1982 annual listing reflects companies in existence in 1980 and 1981. Excluded in the counts on Figure 3-40 are individuals and non-U.S. companies; included are avocational, amateur, and college and university groups. Of the 261 companies in the "serious/professional" group shown on Figure 3-37, all but three were listed in Dance Magazine. The problem with using Dance Magazine data as a count of the universe is that no distinction is made between profit and nonprofit groups. In fact, many of the listings may not be true organizations, but a number of dancers working with a particular choreographer in a semi-formal arrangement. Although the U.S. Census proportion of profit to nonprofit is very large (425 profit, 98 nonprofit: see Figure 3-2), the proportion in Dance Magazine is not that large. Over two-thirds of the organizations seemed from their name, location, or institutional affiliation to be nonprofit, and most (not including the 261 larger organizations) seem to be very small and/or avocational, with very small budgets.

The categories of these dance companies in the Census data fit our classification scheme (see Chapter 2) with Children's Dance Theatre, Historical and Tap Dance Companies, and Special Attractions falling mostly within our "Other Dance Company" category. Some Special Attractions are multidisciplinary and/or interdisciplinary performing arts and thus might overlap with that category.

Figure 3-41 is a worksheet showing both the reported dollar figures and the imputed dollar figures. For 1978, 171 companies together reported $49.223 million. The NARB companies were imputed using a middle range between the averages reported for 1975 and 1980 (see Figure 3-33). That produces a total dollar size of the "serious/professional" category of dance companies at $52.823 to $55.973 million in 1978 or roughly $53 to $56 million. Avocational groups cannot be segregated from college and university troupes, but the total of the two groups is estimated at 100 to 200 additional companies. They would account for an estimated $0.5 to $4 million. This would make our rough estimate of the dance universe in 1978 at 360 to 460 companies, accounting for a $53 to $60 million budget total.

This universe cannot be extrapolated back to 1970 or forward to 1980; however, it is likely that the number of dance companies has continued to grow, probably at a slower rate. One might be able to guess that by 1980, more than 500 nonprofit dance companies/groups existed.

CHORAL MUSIC

Two sources were found that provided limited data on choral music groups: the 1977 Economic Census and the Association of Professional Vocal Ensembles (APVE). The Census data are described in the early part of this chapter. APVE collected data in 1978 (for the first time) and in 1980. The second survey included additional choral organizations that APVE had identified since the earlier survey. The data from these two sources are presented in Figure 3-42.

As with dance data, the APVE data do not distinguish between profit and nonprofit organizations, so both profit and nonprofit information is from the Census data. Of the APVE categories, Professional represents an independent chorus (not affiliated with or part of another organization) that pays all its singers. Orchestral choruses are subsidiaries of symphony orchestras and will not have totally separable budgets. These organizations represent an overlap with the orchestra universe and its data. Professional church choirs, as identified by APVE, include only those in which all the choir members are paid. Of the community/civic group, even though some choruses are highly respected, not all of their members are paid, so these choruses are not deemed to be "professional."

Figure 3-43 reflects our imputation of the choral music universe, first excluding the orchestral choruses, then adding them back in. The imputed organizations are nonrespondents that are known, organizations identified by APVE between the 1980 survey and 1982, and APVE's estimate of the number of community/civic groups in existence in 1981. Thus, we impute roughly 1,100 choruses with budgets of $12 to $22 million.

CHORAL MUSIC DATA SETS

		Number of Organizations	Total $ (000's)	Average $ (000's) Per Organization
1977	Census			
	Nonprofit	28	$ 2,062	$ 73.5
	Profit	18	1,889	104.9
	TOTAL	46	$3,951	
1978	APVE - Survey			
	Professional (Autonomous)	15	$2,140	$142.6
	Orchestral*	2	550	275.0
	Nonprofessional*	7	120	17.1
		24	$2,810	$125.4
	Nonrespondents**** (APVE members)	32	480 - 2,400	15 - 75
		56	$3,290 - $5,210	
1980	APVE - Survey			
	Professional	18	$2,585	$143.6
	Orchestral**	16	400 - 800	25 - 50
	Community/Civic***	17	277	16.3
		51	$3,262 - $3,662	$63.8 - $71.7
	Nonrespondents*****	69	1,035 - 5,175	15 - 75
		120	$4,297 - $8,837	

*In 1978, "Orchestral" and "Nonprofessional" total dollars were not reported. However, from footnotes and text we calculated average budget sizes and total dollars. The "Nonprofessional" are choruses who did not pay all the singers.

**Orchestral Chorus figures not reported. Estimates developed from symphony data reported to ASOL.

***In 1980, APVE included a new category: Community/Civic.

****Total and average dollars are estimates based on reported figures.

FIGURE 3-42

ESTIMATE OF TOTAL BUDGET SIZE OF CHORAL MUSIC UNIVERSE - 1980

	Reported/Calculated Data			Imputed Data		
APVE Category of Chorus	Number of Organizations	Total $ (000's)	Average $ (000's) Per Organization	Number of* Organizations	Total $ (000's)	Average $ (000's) Per Organization
Professional	18	$2,585	$143.6	10-15	$1,000 - $1,875	$100 - $125
Professional Church**	—	—	—	65	4,875 - 9,750	75 - 150
Community/Civic	17	277	16.3	1,000	3,000 - 8,000	3 - 8
Subtotal	35	$2,862		1,075 - 1,080	$8,875 - $19,625	
Approximately 1,100 Independent Choruses at $11,737,000 - $22,487,000						
Orchestral Choruses Reporting to APVE	16	400 - 800	25 - 50	-	-	-
Total (35 + 16)	51	$3,262 -		$1,075 - $1,080	$8,875 - $19,625	
Approximately 1,125 Choruses at $13,212,000 - $24,367,000						

*The numbers of organizations represent all those identified by APVE in late 1981. APVE reported 35 professional in late 1981, some of which had moved up from the "nonprofessional/community" category.

**Represents only church choirs in which all singers are paid.

FIGURE 3-43

CHAMBER MUSIC

Three sources include data on chamber music ensembles: the 1977 Census of Service Industries, the Chamber Music America (CMA), and the National Association of Schools of Music (NASM). CMA surveyed its membership twice during the decade (in 1978 and 1980), with three times as many organizations represented in the second survey as in the first (123/41). In addition, NASM provided figures from its 1980 Chamber Music Survey on the number of resident faculty ensembles affiliated with the colleges and universities that were members. No financial data were included. The 1977 U.S. Census presents figures for both profit and nonprofit chamber groups including chamber orchestras. (The 1972 Census does not deal with chamber music as a separate discipline.) CMA's figures deal with nonprofit groups, many of which are not formally organized at all and others of which are affiliated with parent organizations. Even though both private and public institutions are included in NASM's data, the faculty ensembles reported in their figures are considered nonprofit organizations for the purposes of this study. The data from these three sources are presented in Figure 3-44.

CMA defines chamber music ensembles as conductorless groups with one musician to a part, performing concerts for professional fees. This definition eliminates larger groups (orchestras and choruses) and reduces the problem of overlap with other data sources. The U.S. Census figures were not used in calculations of the chamber music universe, owing to the inclusion of chamber orchestras, which are represented in the data base of the American Symphony Orchestra League (ASOL) and the calculation of the orchestra universe presented earlier in this chapter.

Imputations of average and total dollar figures for the chamber music universe are based on statements and figures from both the 1978 and the 1980 CMA surveys. Using the 1980 data, an average income figure for parent-organization-affiliated ensembles was calculated and applied to the faculty ensembles reported by NASM. By this methodology, 15 such organizations reporting to CMA with a total annual income of between $270,000 to $320,000 were identified. If a total of $300,000 is selected for this group as an appropriate round figure, the average income would be $20,000. Therefore, it is estimated that 318 resident faculty ensembles reported by NASM had a total dollar size of $6.36 million.

CHAMBER MUSIC DATA SETS

(Reported/Calculated Data)

	Number of Organizations	Total $ (000's)	Average $ (000's) Per Organization
1977			
Census*	20 (nonprofit)	$2,065	$103.3
	10 (profit)	300	30.0
1978			
CMA** Survey Respondents	41	1,845	45.0
1980			
CMA*** Survey Respondents	122	5,620	46.0
1980			
NASM**** Resident Faculty Ensembles	318	6,360	20.0

*Census provided no definitions. Chamber orchestras are included.

**"Professional, one-musician-to-a-part" ensembles that perform without a conductor.

***Approximately 20 groups are affiliated with a parent organization. Financial data were not reported as dollars but as percents of organizations within dollar ranges. Total dollars were calculated.

****Dollar figures were not reported by NASM but were calculated using CMA averages for "parent organization groups."

ESTIMATION OF TOTAL BUDGET SIZE OF CHAMBER MUSIC UNIVERSE - 1980

	Number of Organizations	Total $ (000's)	Average $ (000's) Per Organization
CMA (1980)	122	$5,620	$46
NASM	300*	6,000	20
All Other Professional	580**	2,320	4

Approximately 1,000 professional chamber ensembles at $13,940,000.

*Less the parent organization affiliated groups included above in the CMA figures.

**Based on CMA's estimate in 1978 of a total of 1,000 groups less the two subgroups above.

FIGURE 3-44

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In 1978, CMA indicated that, although the data for the survey population of 41 organizations reflected an average budget of $45,000, over half of these had annual budgets of less than $12,500 and most of these were between $3,000 and $4,000. Using the 1980 data, an average income of $46,000 was calculated for the 122 groups responding to the survey.

On the basis of the material presented above, three groups of chamber ensembles have been identified that constitute a universe of approximately 1,000 professional ensembles (CMS's estimate) at a total dollar size of $13.9 million. An underlying assumption is that these 1,000 groups include most of the resident faculty ensembles identified by NASM. These universe calculations are also presented in Figure 3-44.

JAZZ GROUPS

No data were found that discussed the jazz group art form (discipline). The only data that included jazz music (jazz dance is included in the dance universe) as a separate category was the 1977 U.S. Census data which listed three nonprofit organizaions (see Figure 3-2) but without the dollar figure. The "Not Appropriately Self-Designated" figure was also not disclosed. Thus, no estimate for the jazz category could be made.

OTHER PERFORMING ARTS

The only way to present other performing arts or multi and/or interdisciplinary arts is as whatever is in the "other" categories in the various multidisciplinary or organizational data sets. Because "other" is an undelineated category by definition, the data included is more or less meaningless, depending on how the "other" data are presented. In the U.S. Census data (see Figure 3-2), the "other" categories include Other Music (Code 792,939) and All Other Performing Arts (Code 792XXX) at 18 and 196 establishments, respectively, and $1.107 million and $73.936 million, respectively. None of the organizational categories discussed previously would be included in these numbers. Presentors and performing facilities would be included and probably constitute most of this category.

The NRCA data (Figure 3-3) has an "Other Music" category that projected a universe of 392 organizations at $28.343 million, or $72,300 average per organization. This category includes all choral, chamber, and jazz music, however, in addition to "other" performing arts organizations.

MUSEUMS

In the discipline of museums, the problems presented by the data in determining the size of the universe and its growth over the seventies differ significantly from problems in other disciplines. In addition to the U.S. Census data available for 1977 only, there have been four surveys since 1966 conducted specifically to describe and measure the universe of museums. However, each of the four surveys used different criteria for inclusion of a museum, and many of the data items asked differed from one survey to the next. Therefore, in spite of the considerable amount of material, comparing the numbers produced from these four surveys and the U.S. Census to measure trends over the decade is almost a fruitless task. Furthermore, except for a few other one-point-in-time, very limited, mostly non-financial surveys, no other data on museums have been collected. Unlike for the performing arts, there is no longitudinal data, i.e., no annual data collection on a particular body of museums.

The four surveys, with the year of the data collected and our abbreviated reference, are these:

> Museums and Related Institutions: A Basic Program Survey, by Lola Eriksen Rogers, Office of Education, U.S. Department of Health, Education, and Welfare, 1969. (1966 data, referred to as the OE study)
>
> Museums USA. National Endowment for the Arts, 1974. Study conducted by the National Research Center of the Arts, Inc. (1972 data, referred to as Museums USA)
>
> The Status of Nonprofit Arts and Museum Institutions in the United States in 1976. National Research Center of the Arts, Inc. A study conducted for the National Endowment for the Arts, et al, 1979. (1976 data, referred to as the NRCA Study--this is the study referred to throughout the discussions in the performing arts)

Museum Program Survey, 1979. Price, Dirocco, and Lewis, Macro Systems, Inc. A study conducted for the National Center for Educational Statistics and the Institute for Museum Services, 1981. (1979 data, referred to as the NCES/IMS study)

We include the OE study within our study of the seventies because its universe more closely approximates the NCES/IMS universe than does either interim study. Also, the 1966 year provides a comparison with the 1979 data on inflationary impact. Since the financial data on the size of museums are given only in ranges, we can measure the impact of inflation only by comparing numbers of organizations above a certain dollar size at the beginning of the decade and those above twice that dollar size in the year when the Consumer Price Index (CPI) doubles. Between 1966 and 1979, the CPI a little more than doubled, thus allowing a rough comparison for real growth in budget size.

The most serious problem with the museum data--the use of different criteria for each survey, which resulted in a different universe described by each study--arose from the lack of definition of a museum. A statndard, generally accepted definition did not evolve until the mid-seventies. The problem faced in the OE study in the mid-seventies was described:

> It should be noted that there were virtually no standard definitions in the museum field at the time of the survey. . . . The lack of a standard, acceptable, workable definition of "museums" proved to be one of the greatest difficulties in the undertaking. Since the definitions of the International Council of Museums (which works in collaboration with UNESCO) and the New York Commissioner's Committee on Museum Resources (Hochschild Report) both include "historic sites," neither was found workable for the study; the inclusion of all historic sites, regardless of their status, would have made the universe completely unmanageable, particularly from the aspects of number and reasonable anticipation of response.[21]

The OE study developed a set of criteria requiring museums to be nonprofit (or scholarly), generally to own the objects exhibited, to have paid staff or catalogued collections or professionally designed exhibits, and to be open a minimum of either four months per year or eight hours per week.

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[21] OE, op. cit. p. 2.

The two studies conducted by NRCA used more rigorous criteria than did the OE study. Both required permanent facilities, at least one full-time paid staff member with academic training or special knowledge about the collection, a minimum budget size of $3,000 ($1,000 for each of three months), and a season that was at least three months long. The 1976 NRCA study also required a "separable budget," which further excluded many university and government-affiliated museums.

The NCES/IMS survey used the definition developed by IMS and its National Museum Services Board, which loosened the criteria, dropping the requirements of owning a permanent facility, having a paid staff, having a minimum budget, and being open a specified minimum time. The criteria used were defined in the following:

> A museum is . . . an institution organized on a permanent basis for essentially educational or aesthetic purposes and . . . utilizes a staff; owns or uses tangible objects, whether animate or inanimate; cares for these objects; and exhibits them to the public on a regular basis.[22/]

Appendix A further details the criteria used in each survey. Of these four surveys, only one was a census, the OE study. The other three were surveys of a scientifically drawn sample from various universe listings. In addition to the difference in universe definition criteria, there was little consistency in data items or classifications within data items among the four surveys. These inconsistency problems are detailed in the discussion below.

One other source of the museum universe size is the Official Museum Directory published by the American Association of Museums and the National Register Publishing Company. This directory lists and describes museums by state and city. The directory has increased its coverage of the field over the decade, thus giving a distorted picture if viewed in isolation. However, a comparison with the universe count for the NCES/IMS survey is interesting.

[22/] NCES/IMS, op. cit. p. 2

The NCES/IMS 1979 survey is based on a universe census conducted in 1978. The NCES/IMS universe found 4,785 museums, using the definition above (including 156 profit institutions). A count of the equivalent year (1978-1979) of the Official Museum Directory showed 4,926 U.S. museums (over 5,400 including Canadian museums). In three states, the numbers matched, while in ten states, the counts were off by more than 20 institutions; in four states, more reported to NCES/IMS and in six, more repoted to the Directory. All other states were off by plus or minus 1 to 20 institutions. The Directory has no criteria for inclusion of a museum (at no cost to the museum); does not require membership in AAM; includes profit, partnership, and individually owned museums; and counts each physical site separately (e.g., universities that have two galleries or museums with two or more locations). Thus, the expectation would be that the Direcory would have more institutions in each state. Approximately 200 duplicates, out-of-business, or not-yet-in-business organizations were found when the NCES/IMS Program Survey was conducted the year following the universe study which lowered the count from 4,785 to about 4,575. Nonetheless, the difference between approximately 4,600 (NCES/IMS count) and 5,000 (Directory count) for all U.S. museums is not substantial, given the criteria of each. This comparison indicates that the NCES/IMS count probably approximates the true museum universe count (using the revised standard definition of museum).

Figure 3-45 presents the four sets of data by type of museum (Art, History, Science, etc.). Stratification by type is difficult to achieve because no definition of type of museum has been included in any survey and because the choice available to a respondent has changed in each survey. The NCES/IMS survey chose to use a detailed classification (one used in the Official Museum Directory), also reproduced in Appendix A. Figure 3-45 also presents total and average dollars for each type of museum. However, these amounts are not comparable from one survey to the next since the type of museum that they represent is not comparable. A comparison of the totals for all museums reflects only the differences in criteria used, not a difference attributable to some change or growth. For example, since the NCES/IMS criteria are the loosest, almost twice as many museums are included, especially smaller ones, as will be shown on the following pages.

One exercise from a stratification by type of museum that might be valuable from the National Endowment for the Arts' perspective would be to determine its

THE MUSEUM UNIVERSES - BY TYPE OF MUSEUM

	Art Museums Only		Science Museums		Art/History and/or Art/* History Museums		All Other Museums		Total Museums	
Source and Year of Data	Number of Organizations	$ (000's)	Number of Organizations	$ (000's)	Number of Organizations	$ (000's)	Number of Organizations	$ (000's)	Number of Organizations	$ (000's)
OE Study (1966)										
Total Number of of Organizations	420	—	431	—	1,424	--	614	—	2,889	—
(data including** in-kinds)	360	$ 75,914 avg: 210.9	336	$49,238 avg: 146.5	1,046	$ 46,476 avg: 44.4	484	$341,411 avg: 705.4	2,226	$ 513,039 avg: 230.5
(data without ** in-kinds)	360	62,659 avg: 174.1	336	47,497 avg: 141.4	1,046	39,330 avg: 37.6	484	326,983 avg: 675.6	2,226	476,469 avg: 214.2
Museums USA (1972)										
(all data without in-kinds)	340	142,483 avg: 419.1	186	52,260 avg: 280.9	683	62,846 avg: 92.0	612	221,323 avg: 361.6	1,821	478,912 avg: 263.0
NRCA Study (1976)										
(data without in-kinds)	331	214,796 avg: 648.9	—	—	780	275,863 avg: 353.6	359	265,311 avg: 739.0	1,470	775,970 avg: 514.3
Census (1977)										
(data without in-kinds)	—	—	—	—	—	—	—	—	2,252	613,131 avg: 272.3
NCES/IMS Program Survey (1979)										
(data without in-kinds)	609	275,264 avg: 452.0	—	—	2,204	226,423 avg: 102.7	1,595	515,106 avg: 322.9	4,408	1,016,793 avg: 230.7

*Types of Museums were Art/History, Art/Science, or Art/History/Science or Museums predominantly of those types.

**Data were reported both with and without valuation of volunteer services and in-kind contributions included.

FIGURE 3-45

possible museum constituency. That constituency might be defined as all museums with an art collection or by presenting art exhibits. Type of museum, however, does not equal to type of collection exclusively. For example, one multiple choice question asked by the NCES/IMS survey was "type of object(s) that constitute an important part of the institution's collections." Forty-seven choices were offered, of which seven were classifications that could be defined as an "art" category (see Appendix A for a listing of collection types). The percentages of types of museums that checked "Fine Arts," one of the seven art categories, provide an instructive example:

34.7 percent of	4,408	total museums	(1,530 museums)
90.6 percent of	609	art museums	(552 art museums)
10.0 percent of	51	children's museums	(979 non-art museums)
52.5 percent of	382	general museums	
27.1 percent of	2,204	history museums	
21.5 percent of	165	parks and visitor centers	
12.1 percent of	800	science museums	
1.4 percent of	197	specialized museums	

Therefore, within that one subcategory of art, more non-art-type museums reported art collections than did art museums. Furthermore, under the categories of science museums and collections are the subcategories of archeology and anthropology museums and collections. These can and have been considered to be within the realm of art. The point of this discussion is that counting art museums or art collections is impossible from these data and, therefore, the rest of this discussion will deal with the other aspects based on all museums.

Figure 3-46 breaks out the same four data sets by governing authority. (The NRCA Study did not stratify by governing authority.) All three studies show a little over half of the museums to be private, nonprofit organizatons. Museums USA seems to have excluded a number of federal and state government museums, especially larger ones. Thus, the average budget size is much lower for these two groups in the Museums USA data rather than higher, which would be the expected result. The rough percentages of types of museums when divided into nonprofit, all government, and all educational (university, etc.) groups is similar in all three studies. However, the percentage of total dollars represented by each group does change, as shown below.

THE MUSEUM UNIVERSES BY GOVERNING AUTHORITY OF MUSEUM

Source and Year of Data	Nonprofit* (Including Church)	Federal	State	Local	Public Educational (All Levels)	Private Educational (All Levels)	Other**
OE Study (1966)							
Total number of organizations: 2,889	1,452	286	331	413	319		88
Total organizations reporting $: 2,226	1,170	192	209	334	262		59
Total $ (000's) with in-kinds: $513,037	$139,309	$100,814	$93,491	$59,278	$113,115		$7,030
Average $ (000's) with in-kinds: $230.5	$119.1	$525.0	$447.3	$177.5	$431.7		$119.2
Total $ (000's) without in-kinds: $476,470	$122,991	$97,855	$92,823	$45,754	$110,027		$7,020
Average $ (000's) without in-kinds: $214.0	$105.1	$509.7	$444.1	$137.0	$420.0		$118.9
Museums USA (1972)							
Total number of organizations: 1,821	1,018	112	215	296	98	82	—
Total $ (000's): $478,912	$313,096	$52,894	$32,763	$54,656	$13,939	$11,564	—
Average $ (000's): $263.0	$307.6	$472.3	$152.4	$184.6	$142.2	$141.0	—
NRCA Study (1976)	Data and Tabulation by governing authority not included						
NCES/IMS Program Survey (1979)							
Total number of organizations: 4,408	2,377	344	488	634	322	154	89
Total $ (000's): $1,016,793	$608,821	$85,309	$88,548	$149,266	$35,750	$22,534	$26,564
Average $ (000's): $230.7	$256.1	$248.0	$181.5	$235.4	$111.0	$146.3	$298.5

*Nonprofit museums are those that are usually tax-exempt 501(c)(3) organizations (there are other types of nonprofit designations) and include those affiliated or run by church/religious organizations but not those run by educational organizations.

**Represents company, commercial, individually owned and partnership museums. In the OE Study, these are mostly but not exclusively profitmaking. In the NCES/IMS Program Study, the 89 are all nonprofit.

FIGURE 3-46

	Types of Museums		
	Nonprofit	Government	Educational
OE Study (1966)			
Organizations	50.3%	35.6%	11.0%
Dollars	27.2%	49.4%	22.0%
Museums USA (1972)			
Organizations	55.9%	34.2%	9.9%
Dollars	65.4%	29.3%	5.3%
NCES/IMS (1979)			
Organizations	53.9%	33.3%	10.8%
Dollars	59.9%	31.8%	5.7%

The significant difference between the OE study and the two later studies suggests that a change may have occurred, with the nonprofit sector gaining in dollar size in relation to government and educational museums. However, the total dollars (000s) reported in OE's educational group ($113,115) does seem extraordinarily high in comparison with the total amount reported in Musums USA ($25,503) and NCES/IMS ($58,284). This discrepancy still does not explain the total difference between the OE and the other two surveys.

Stratifying museums by governing authority does allow a proper comparison with the U.S. Census data. The Economic Census does not include government and educationally affiliated museums. Census data counted 2,252 museums at $613.313 million as compared with NCES/IMS, which counted 2,354 non-church, private museums at $607.791 million. Census had no definition of a museum, so the difference in the data, i.e., fewer museums with greater dollars for a time period two years earlier, could be a result of the inclusion of some larger non-museum in the Census data, or a problem with the sample drawn from the NCES/IMS universe for the program survey.

Figure 3-47 breaks out the data by budget size ranges. The OE study and the NRCA study both report only number of organizations without total dollars for each range. The NCES/IMS data has a different set of ranges at the top end. Instead of using $250,000, $500,000, and $1 million, the NCES/IMS study uses $200,000 and $400,000 only. Thus, the upper ranges are not truly comparable.

THE MUSEUM UNIVERSES BY BUDGET SIZE OF MUSEUM

	OE Study (1966)		Museums USA (1972)		NRCA Study (1976)		NCES/IMS Study (1979)	
Range of Operating Expenses	Number of Organizations	No Total $ Reported	Number of Organizations	Total and Avg. $ (000's)	Number of Organizations	No Total $ Reported	Number of Organizations	Total and Avg. $ (000's)
Under - $25,000	1,891	—	831	$20,474 24.6	441	—	1,800	$ 15,064 8.4
$25,000 - 49,999	273	—					578	20,869 36.1
$50,000 - 99,999	232	—	338	24,498 72.5	299	—	634	46,485 73.3
$100,000 - 249,999	204	—	313	49,196 157.2	387	—	545*	78,979 144.9
$250,000 - 499,999	90	—	175	55,670 318.1	154	—	323*	93,989 290.9
$500,000 - 999,999	47	—	82	58,838 717.5	56	—	463*	761,406 1,644.5
$1 Million - $5 million	51	—	82	270,238 3,295.5	103	—		
Over - $5 Million					28	—		
Reporting $0, or No Data Available	101	—	—	—	—	—	65	0
TOTALS	2,889	—	1,821	$478,912	1,468 **	—	4,408	$1,016,793

*The Budget Ranges differ: 545 between $100,000 and $200,000; 323 between $200,000 and $400,000; and 463 over $400,000.

**This total equals 1,468, whereas elsewhere in the NRCA Study, the total is 1,470 Museums.

FIGURE 3-47

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An important item is that the NCES/IMS data counts 1,800 small museums (under $25,000 budget size). These 1,800 museums had an average budget size of $8,400, which implies that there are probably more than 1,000 museums that are below the average, since the top end of the range is $25,000.

Another way to look at museums by size is the total number that are under or over a certain dollar size. Figure 3-48 provides a breakout of the number of organizations above or below certain amounts. Although these four surveys used different criteria for inclusion and exclusion, the criteria have little or no effect on the larger museums. Museums over $100,000 will have full-time, paid staff, be open more than three months, far surpass the minimum budget size, and have a permanent facility. The NRCA criterion of having a "separable budget" is the only criterion that would have a significant effect in larger museums. Therefore, comparison of museums over $100,000 and probably also those over $50,000 in three of the surveys is possible. All museums over each of these two amounts show a steady increase: over the 13 year time span, a 314 percent increase in the number of museums over $50,000 and a 340 percent increase in the number over $100,000.

As in other disciplines, the impact of inflation on museums was severe in the seventies, especially the late seventies. Between the time of the OE study and the NCES/IMS study, the Consumer Price Index went from 95.8 (adjusted for fiscal year basis) to 181.4 (adjusted). Thus, inflation almost doubled prices. To have kept up with inflation, a museum would have had to more than double in dollar size between the two surveys. With the data from these four surveys, we cannot track individual museums; however, we can compare the total number that were above $50,000 and $100,000 in 1966 with the total number of museums above $100,000 and $200,000, respectively, in 1979. This will give a rough comparison of how well the group of medium to large museums have kept up with inflation. The lines in Figure 3-48 show the comparisons that are possible from the data. The increase between $50,000 museums in 1966 and $100,000 museums in 1979 reflects a 213 percent real growth in number of institutions, and the increase between $100,000 and $200,000 museums reflects a 200.5 percent real growth. This indicates substantial growth at the top end of the field. (An equal number of museums would represent no real growth.)

THE MUSEUM UNIVERSES BY BUDGET SIZE OF MUSEUM FORMATTED TO ASSESS INFLATIONARY IMPACT ON SIZE

	Number of Organizations			
Range of Operating Expenses	OE Study 1966	Museums USA 1972	NRCA Study 1976	NCES/IMS 1979
All Museums Below $50,000	2,164	831	441	2,378
All Museums Above $50,000	624	990	1,027	1,965
All Museums Above $100,000	392	652	728	→1,331
All Museums Above $200,000	N/A	N/A	N/A	→786
All Museums Above $250,000	188	339	341	N/A
All Museums Above $400,000	N/A	N/A	N/A	→463
Number Not Reporting	101	0	2 *	65
Total Number of Museums	2,889	1,821	1,470	4,408

*rounding error

The lines connect the two figures that can be compared for real (i.e., without inflation) growth.

FIGURE 3-48

Without total dollar amounts for the OE study, an analysis of the largest museums is impossible. These museums have the greatest impact on total dollars and can skew average data. Fortuitously, the Museums USA range of budget size allows a comparison with the NCES/IMS data. The Consumer Price Index grew by 66 percent between 1972 and 1979, and the difference between a $250,000 budget (a 1972 budget breakout) and $400,000 budget (a 1979 budget breakout) is also 66 percent. Therefore, a comparison can be made between all museums over $250,000 in the Museums USA data with all museums over $400,000 in the NCES/IMS data. The comparison shows 124 additional museums (a 37 percent real growth in the number of large museums).

With these two sets of data are total dollar amounts. The 339 museums in 1972 had $384.746 million total ($1,134,000 average budget). To keep pace with inflation, this amount would have to increase by 66 percent by 1979; i.e., these 339 museums would have had to generate $538.678 million. Although we do not know what these particular 339 museums generated, the 463 museums above $400,000 reported in the NCES/IMS data generated $761.406 million ($1,644,000 average budget). The increase in average budget size from $1.134 to $1.644 million represents only a 45 percent increase, but the inclusion of 124 more museums in the NCES/IMS average represents new (and smaller) museums entering this group. These 124 more museums generated $122.728 million more, or an average of $989,700 for the 124 additional museums. The $989,000 is almost two and a half times the budget size of a museum that would just need the $400,000 criterion of inclusion. Thus, these additional 124 museums have also grown at a rate greater than inflation. This convoluted analysis tries to show that real growth occurred at the top end of the spectrum, as long as we assume all the universe surveys counted or projected the top end of the museum field the same way.

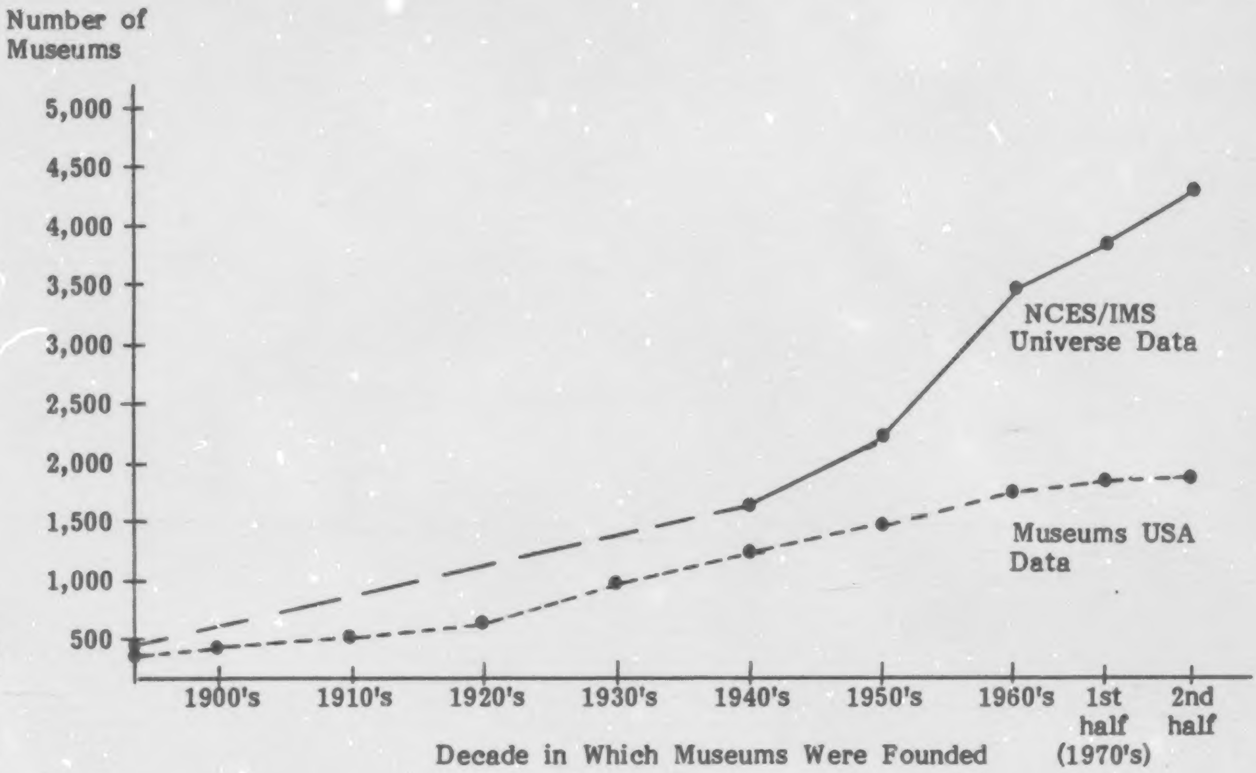
The bottom end of the field is much more difficult to assess because the change in criteria affects that end of the spectrum almost exclusively. Figure 3-48 showed that the museums under $25,000 numbered 1,800 in the NCES/IMS 1979 data, and that these museums' average budget size (without in-kind contributions) was $8,400. As stated before, this implies that probably about 1,000 museums were under the $8,400 average. Most of these museums would not have met the minimum criteria set in the three earlier surveys. To compare the NCES/IMS data with the earlier surveys, we eliminate all those under $25,000. (By eliminating all museums under $25,000, we eliminate some of the small museums that would be included in earlier surveys. A $10,000 breakout would have been better, but the only choice was $25,000.)

Without the 1,800 museums at $15.064 million, the total number of museums in the NCES/IMS data is 2,608 at $1,001.729 million, or an average budget size of $384,100. This compares to an average budget size of $214,000 in the OE data for 2,226 museums. With inflation, the average budget size of $214,000 should have almost doubled, i.e., to approximately $405,000. However the average budget size as reflected in the NCES/IMS data grew only 79.5 percent to $384,100, not even keeping up with inflation. However, the analysis of the top end of the museum industry showed that larger museums outpaced inflation. Thus, even with all small (under $25,000) museums eliminated from the NCES/IMS 1979 data, it appears that the smaller museums as a group did not keep pace with inflation. Obviously, many individual ones did keep pace because they moved into the higher ranks.

The final figure on museums (Figure 3-49) looks at the age of museums. Two of the four surveys included founding dates in the data. The NCES/IMS program survey did not include age, but the preceeding universe survey in 1978 did. The universe survey had 4,784 museums as the total, whereas the program survey had 4,408. The difference included 156 profit museums and 49 duplicates, with the remainder being out-of-business, not yet in business, or organizations that were not really museums. Figure 3-49 shows both the surveys that showed age on a single graph and presents the data below the graph.

Museums are the oldest discipline in the arts with 350 to 400 being founded prior to 1900. In fact, many of these largest museums have already celebrated their centennials. The difference in the criteria for conclusion in each of the two surveys could explain much of the difference between the two lines shown on the graph. Since many of the very small museums excluded from Museums USA data are also probably not more than 20 years old, this could explain the large jump in the NCES/IMS line. Nonetheless, according to the NCES/IMS data, 1,955 museums have been founded since 1960. Even with the 220 suspect museums (those nonprofit ones eliminated from the universe survey for the program survey) excluded, there remain at least 1,735 founded since 1960 and over 500 museums founded in the seventies.

NUMBER OF MUSEUMS IN OPERATION AS COUNTED IN 1972 AND 1978



Decade of Founding	Museums USA (1972) Count of Museums	NCES/IMS (1978)* Count of Museums
1975 - 1978	—	314
1970 - 1974	18**	447
1960's	291	1,194
1950's	291	584
1940's	182	1,263
1930's	328	
1920's	182	
1910's	91	
1900's	55	
pre 1900	364	401
N/A	18	581
TOTALS***	1,820	4,784

*NCES/IMS Program Survey did not include data on founding date; however the NCES/IMS Universe Survey did. The Universe Survey found 4,785 Museums. See text on discrepancies in the Universe Survey data.

**The 18 Museums represent only those founded in 1970 and 1971 and meeting the survey's criteria.

***Neither Total matches reported data of 1,821 and 4,785 Museums, respectively, probably due to rounding.

FIGURE 3-49

Chapter 9 discusses a longitudinal museum data base built specifically for this study.

NEW ARTS SPACES/ALTERNATIVE SPACES

A group of exhibition/visual arts institutions that have deveoped largely during the 1970s are the New Arts/Alternative Spaces. These are (physical) spaces for the creation, exhibition, and performance of contemporary art. This type of organization is described in a collection of essays in The New Artsspace, published by the Los Angeles Institute of Contemporary Art (LAICA Journal) in conjunction with a conference in 1978. One of the essays describes these spaces as follows:

> The history of alternative spaces in this country is rather brief. Beyond co-op galleries which were essentially extensions of the commercial gallery system, the first serious alternative spaces were the Museum of Contemporary Art in Chicago, and the Contemporary Art Museum, Houston. Patterned after the German kunsthalle, they were to be places for exhibition of contemporary work and not centers of collecting. Technically, according to the accepted definition, they are not museums at all and calling them museums only confused the issue further. However, because they are reasonably well-administered, curated and publicized, and because they exist in buildings which mimic museum structures ("clean, well lighted spaces"), the exhibitions they produce receive the same credibility with the art press, collectors, audience, and financial support as a museum normally would. In recent fact, they have both become museums by beginning permanent collections.[23/]

Besides the 12 essays, the journal contains a photocopied data sheet and a one-page narrative statement on each of 51 New Arts Spaces. Although there was no obvious attempt for statistical rigor, the information contained on the data sheet does provide a good description of the activities and functions of these organizations and some usable data.

[23/] Hopkins, Henry T. Art Museums and Alternative Spaces. The New Artsspace, LAICA Journal, April 26, 1979. pp. 20.

Because these organizations grew out of (or in response to) the museum, there is overlap with the museum universe. In fact, according to the current broad definition of museum used by AAM and IMS (see preceding Museum secton and Appendix A), all but a handful of these organizations could belong in the museum universe. Only six were found in the AAM Directory for 1978, but one could assume that these alternative spaces would often choose not to be in the Directory.

Overlap occurs not only with museums (we found six such organizations), but also with Media Arts Centers (at least four organizations), Literature (at least one magazine/publisher), and Performance Facility (an organization type that was also in the NOI Census (see Opera section).

Figure 3-50 shows data reported on these 51 organizations. The 1978 figures are projected and probably are on the optimistic side. (In most data we have examined, estimates of budget size of the current year are usually too high.) Thus, the 39 organizations probably represent a figure closer to $2.5 million.

The founding dates show that only one of these New Arts Spaces, in addition to the museum founded in the 1870s, existed before 1965, and 43 of the remaining 46 (93 percent) were founded in the seventies. Therefore, growth in this discipline has gone from almost zero to whatever the true universe is.

In a 1981 conversation wth Olivia Georgia of the Washington Project for the Arts (one of the 51 organizations in the LAICA journal survey mentioned above), the statement was made that approximately 500 New Arts/Alternative Spaces exist.

The bottom part of Figure 3-50 imputes the total dollar size of the New Arts/Alternative Spaces universe using 500 organizations. The 460 additional organizations are imputed using an average budget size in the range of $5,000 to $20,000. The resulting dollar size of such a universe would be between $4.8 and $11.7 million.

NEW ARTS SPACES/ALTERNATIVE SPACES
Included in LAICA Journal of 4/26/78

	Number of Organizations*	Total $ (000's)	Average $ (000's) Per Organization
1976	30	$1,259,197	$41,973
1977	36	1,772,822	49,245
1978 (Projected figures)	39	2,824,904	72,433

* 40 of the 51 organizations reported dollar figures. One organization, a performing arts center, was excluded. Other biasing organizations (the museums and a college gallery) did not report expenses. Therefore, a sample of 39 organizations over 3 years is reflected in the figures above. The smaller number of organizations in 1976 and 1977 represent those that did not begin operations.

Founding Dates		
1975 - 1978	19	
1970 - 1974	24	
1965 - 1969	2	
1960 - 1964	—	
1950 - 1959	1	
pre-1950's	one	museum founded in the 1870 s
	47	
	4	no information
	51	

THE ESTIMATE OF TOTAL BUDGET SIZE OF NEW ARTS/ALTERNATIVE SPACES - 1978

Number of Organizations		Total $ (000's)
39	Organizations reported above at about	$2,500
460	Organizations at an average budget size in a range of $5,000 to $20,000	2,300 - 9,200
500	**Organizations**	**$4,800 - $11,700**

FIGURE 3-50

MEDIA ARTS CENTERS

Arts organizations that are involved in the electronic and film media are also products of the seventies. In our classification scheme, the organizations in this group are Audio/Film/Video Producers, Radio/TV Broadcasters, and Media/Film Centers.

Theoretically, these organizations could appear somewhere in the Economic Census, but its structure provides no data on this field. The NRCA study had no designation for media organizations, so no data exist from that source. Only one source of data was found describing the media field. In 1979, participants at the National Conference of Media Arts Centers represented 45 "media" organizations plus The American Film Institute of the Kennedy Center for the Performing Arts in Washington, D.C., and the Independent Documentary Fund of the Television Laboratory of WNET/13 in New York, and foundation and government funding sources. The report from the conference included statistics on the 45 media organizations. The following descriptions of this type of organization comes from the preface of this report:

> "Media arts centers" are institutions that provide facilities for making, studying, exhibiting, presenting, and distributing (some through broadcasting) those film and video works that are independent, as well as all the other film and television recognized as art.
>
> "Independent film and video" describes a part of the field of noncommercial motion pictures and television. Central characteristics of films and tapes so produced are production by small groups or a single film/video maker on personal initiative, as opposed to products made by companies with commerical objectives. Exhibition and distribution of these films and tapes is to viewers concerned with (1) their message, but more often, (2) the artistic dimensions of the film or tape. Other related terms associated with this field are personal film/video, film/video art, cinema verite, and avante garde film/video.24/

24/Foundation of Independent Video and Film. The 1979 National Conference of Media Arts Centers. New York. 1979. p. 1.

The 45 media arts centers participating in the conference included six programs within museums, four programs within universities, and 35 independent institutions. The museum and university programs represent obvious overlap with other types of arts organizations. In addition, among the 35 independents are organizations that also overlap into other disciplines, one example of this being the Kitchen Center for Video and Music, which appears in the museum listings and New Arts/Alternative Spaces. However, since the data about these 45 media arts centers is presented in aggregate only, there is no way to eliminate the overlap.

These 45 organizations reportedly represent $5 million in total expenditures. (The exact year represented by this amount is unclear, as is what part of institution is being presented--the film/video portion only or the whole organizations. The year on which the dollar figure is based is probably 1978, and the $5 million probably represents only film/video activities.)

The functions performed by these organizations are exhibition, archives and collections, equipment access, publications and newsletters, periodical/book libraries, television broadcasting, film distribution, teaching and education, and public information services.

The percentages of the 45 organizations performing these functions was not uniformly provided; however, 90 percent of the organizations were noted as performing an archival/collection function (20 percent on a formal basis) and 80 percent as performing a library function. Along with the exhibition functions, this would make these organizations fall within the museum universe as defined by AAM and IMS.

The founding dates were not given for all organizations, however:

> Media Arts Centers are new--as of 15 years ago, they did not exist in this country. Many Media Arts Centers were founded in the years 1969-1973.[25]

We have no estimate for the size of the total universe of media organizations. Theoretically, all the public broadcasting organizations could be included. However, as a group, broadcasters represent organizations that are broader than the arts alone and have the same biasing effect as colleges and universities. With the elimination of public broadcasting organizations, the media arts organization universe would consist of these 45 media arts centers (most of which are multifunctional) and "thousands of local film/video organizations nationally . . . many of these being smaller, younger with narrower interests,"[26] i.e., single or dual functional. A difficulty in counting the universe will be in separating an organization from an individual. Noncommercial films, tapes, and video works are usually produced under the direction of an individual or informal group, not an organization. Therefore, in counting the universe of media arts organizations, these would be eliminated.

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[25] Ibid. p. 1.

With the limited amount of information, not even a guess at a universe size can be made. However, excluding the American Film Institute and the public broadcasters (both of which theoretically belong in this universe), the $5 million figure would probably increase to about double ($10 million, perhaps) with the inclusion of the thousands more small media organizations.

LITERATURE

Within the discipline of Literature are four types of organizations: Small Presses, Literary (little) Magazines, Review Journals, and Distributors of Literary works. The U.S. Census theoretically covers literature in the Census of Manufacturing (see earlier section in this chapter); however, no taxable/tax-exempt distinction is made in this area of the Economic Census. Furthermore, a significant portion of literature organizations within the arts are not independent, under the auspices of other nonprofit organizations and, thus, would not be counted by the Census. The other universe sources, NRCA and Ford Foundation, have not dealt with this group.

The only data available in this discipline covers small presses and literary magazines. The source is Dustbooks' annual International Directory of Little Magazines and Small Presses (data compiled and supplied to us by the publisher Len Fulton). The figures provided do not always match among the data supplied, but the magnitude of the figures is the same. As Fulton states in his essay on the 1976 data:

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[26] Ibid. p. 2.

> Characterizing the small magazine or press satistically carries hazards. The business of quantifying literary or print materials of any kind, in my experience, awakens a sort of uneasiness about visiting the "numbers game" upon the innocence of art--with perhaps some good reason, though it is unlikely that art is so fragile that it cannot stand up to counting. The good reason for the uneasiness lies in the extent to which the numbers are taken to possess some immutable "truth" about this field of publishing and, thus, to hold dominion over all other senses of it. Anyone who has worked with small magazines and presses long knows that there is both flux and evanescence that must be accounted for, so that yesterday's figures are suspect today. The data in the following tables should be taken as simply another way of describing a phenomenon, whose most salient characteristic is motion, by freezing it fast at a given time and place.[27/]

Figure 3-51 presents Fulton's 1980 data and some from 1976. The top portion of the figure shows the number of single literary operations for 1974 through 1980. For two of the years, comparable figures for the number of U.S. presses and magazines were available. Some magazines have a separate press listing, thus the higher figure for total U.S. presses and magazines. The data do not provide any indication of profit/nonprofit status nor whether these magazines and presses are subsidiaries of other arts, cultural, or educational organizations. However, it is likely that the International Directory includes both profit (probably few in number) and nonprofit organizations. Also, the information on both media arts centers and new arts/alternatives spaces (discussed in previous sections) noted that both of these types of organizations published literary materials, some of which magazines might be in the International Directory.

The bottom half of Figure 3-51 shows the division between little magazines and small presses, and for 1976, whether the publication/press was literary or nonliterary. (N.B., "nonliterary" does not indicate nonartistic publishing.) The 1976 figures are based on operations, the 1980 figures count the number of magazines and presses. (Presses publish books of poems, novels, nonfiction, etc.)

[27/] Fulton, Len. "Counting Fry." Unpublished document. 1976. p. 1.

DATA ON LITERATURE ORGANIZATIONS

Year	Single Operations (i.e., Number of Organizations)	Number of Presses and Magazines
1974	997	—
1975	1,331	—
1976	1,485/1,550 *	approx. 2,024
1977	1,780	—
1978	1,950	2,250
1979	approx 2,075 **	—
1980	2,452	3,054/3,082 *

1980 Number of Presses and Magazines

Little Magazines	1,439	47%
Small Presses	1,643	53%
Total	3,082	100%

1976 Type of (single) Operation and Type of Material Published

	Total	Literary	Non-Literary	Unknown
Little Magazines	872	565	265	42
Small Presses	444	222	141	81
Both	234	207	17	10
Total	1,550	994	423	133

*Conflicting figures found in the data sources
**An imputation based on the number of listings in the 1979 edition.

Source of Data: Fulton, Len Dustbooks, Paradise, California.

FIGURE 3-51

Figure 3-52 shows the age of magazines and presses as of 1976. This includes foreign as well as U.S. data; however, it seems unlikely that data for the U.S. only would differ significantly. As is the case in most data on the arts, Fulton's statistics probably show a combination of actual growth and his identificaton of publications rather than growth only. However, in 1967 (the closest year of data to 1970), the International Directory had 668 magazines and presses; in 1976, the number of those listed with founding dates of 1967 or before was 358. Those figures imply that 310 magazines and presses (46 percent) that existed in 1967 disappeared between then and 1976 (10 years later). Len Fulton noted that the average life of these magazines and presses that do not make it to the "ten years and older" category is about 4 to 5 years. Figure 3-53 graphs the founding dates of the magazines and presses that existed in 1976.

No indication of dollar size of these organizations is given in the data. However, few literary organizations that apply to the National Endowment for the Arts approach or exceed $100,000 in budget size. Most are relatively very small operations. If one used a range of average budget size for the approximately 2,500 U.S. organizations of between $5,000 and $15,000, the total budget size of the literary discipline of magazines and small presses would range from $12.5 to $37.5 million.

CRAFTS MEMBERSHIP ORGANIZATIONS

The creation of art in the media of fiber, clay, metal, wood, glass, leather, and paper falls mostly within the discipline of crafts or folk art. As with most types of visual arts, the creation of crafts is carried out by individual artistis, not by organizations. However, over the last few decades, membership organizations of crafts artists have developed.

In 1978, Mathematica Policy Research conducted a National Survey of Crafts Membership Organizations for the National Endowment for the Arts. The results of this survey provide the only available data on the crafts discipline. Mathematica's definition of a crafts membership organization for their survey was an "association or group of individuals, including at least some persons active in crafts, that meet more or less regularly to serve their members' interests." Mathematica described a typical crafts membership organization as follows:

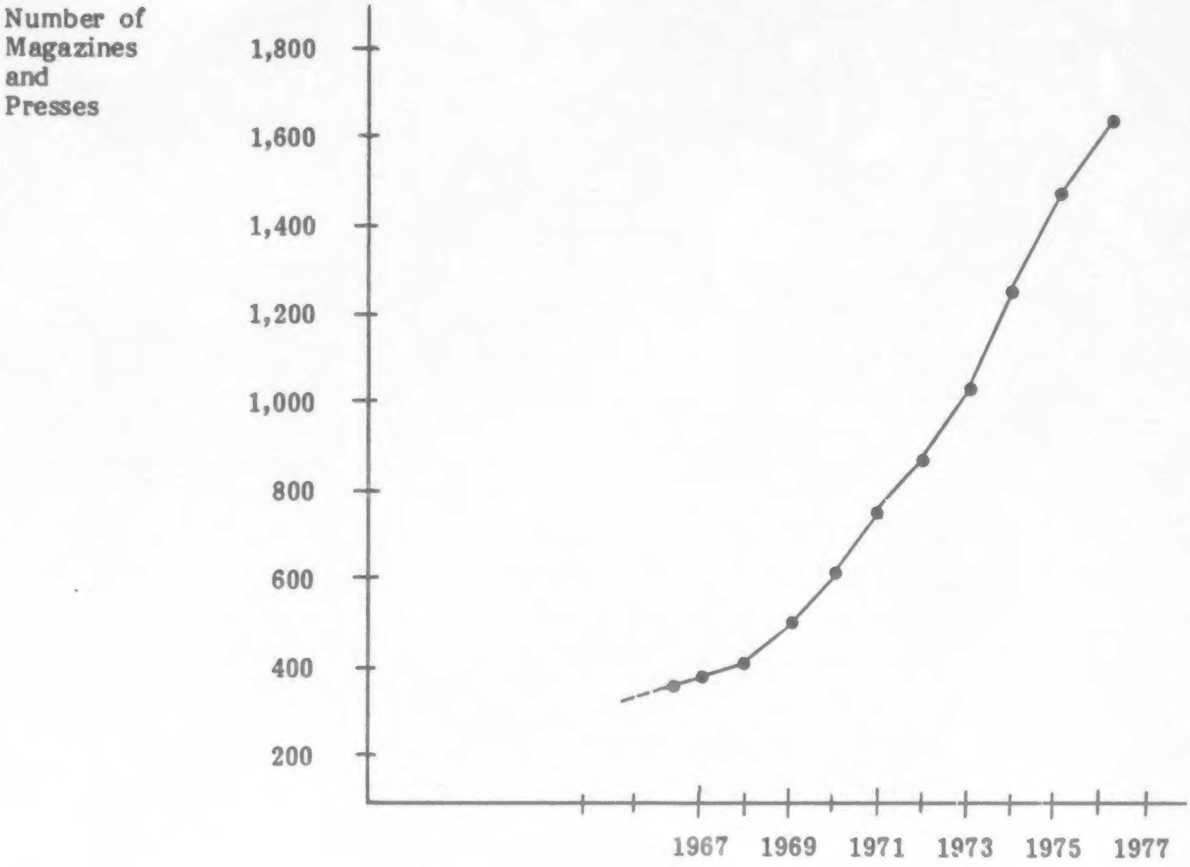
AGE OF MAGAZINES AND PRESSES IN 1967 AND 1976
(Includes U.S. and Foreign Publications)

	1976 STATISTICS		1967 STATISTICS	
Founding Date	Number of Organizations		Number of Organizations	
1976	98		—	
1975	223		—	
1974	224		—	
1973	154		—	
1972	150		—	
1971	130		—	
1970	110		—	
1969	88		—	
1968	72		—	
1967	47	358	57	668
Pre 1967	311		611	
	1,607		668	
	+ 417	unknown founding date		
tal 1976	2,024	Magazines and Presses		

difference between 1967 and 1976 = 310 or 46% no longer in operation.

FIGURE 3-52

NUMBER OF LITTLE MAGAZINES AND SMALL PRESSES IN OPERATION - 1976
(Age of Literary Organizations - U.S. and Foreign)



In addition to the 1,607 graphed above, 417 had unknown founding dates
Source of Data: Fulton, Len. (see Figure 3-52)

FIGURE 3-53

> The "typical" crafts membership organization has been in existence for about 10 years and has 90 members who come from the local area and are accepted without prior screening of their work. Not all of the group's members work in the same kind of crafts medium, but the majority work with clay and fiber. The typical crafts membership group is involved during the year in putting on crafts exhibits, sales, and workshops--all open to the general public--and social functions for members. The typical crafts membership organization is a nonprofit corporation that owns and/or rents facilities and has a budget of about $3,500 per year, obtained largely from membership dues and proceeds of sales.[28]

Mathematica's survey located 947 craft membership organizations, from which they estimated the universe of craft organizations to be 1,218. Of the 904 organizations that responded to the questions of incorporation and nonprofit status, over half (479) were nonprofit and incorporated, under 10 percent (84) responded that they were not nonprofit (or did not know). The other 341 organizations (over one-third) answered that they were not incorporated (which meant that nonprofit status was not asked). These organizations are either informal groups who may or may not be nonprofit and may or may not be independent organizations. Many would likely be subsidiaries of other educational, arts, or cultural organizations. This data suggests that of Mathematica's universe of 1,218 crafts organizations, approximately 100 (less than 10 percent) would be for-profit institutions and, thus, excluded from the universe of nonprofit arts organizations. The data also suggests that some portion (theoretically up to one-third, but most likely 10 to 20 percent) are subsidiaries or connected with some other organization. These would be the crafts organizations that might overlap with other disciplines. However, since little evidence of crafts media has appeared in any other discipline data except possibly museums (and museums were a type of organizaton deemed to be out-of-scope in this data by Mathematica), any possible overlap will be ignored.

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[28] Mathematica Policy Research. National Survey of Crafts Membership Organizations. National Endowment for the Arts. 1978. p. 178.

Figure 3-54 presents Mathematica's expenditure data. Since the data were gathered in ranges rather than actual dollar amounts, Figure 3-54 presents three imputations: one using the low point of each budget range multiplied by the number of organizations in the range, one at the mid-point, and one using the high point. The low and high points give a theoretical minimum and maximum for organizations reporting.

To inpute the dollar size of the crafts universe, the mid-point was chosen. To the 907 reporting organizations, a range of dollar size for 40 nonreporting and 271 nonrespondent organizations was added. The total universe of over 1,200 crafts membership organizations generates roughly between $30 and $35 million.

Figure 3-55 provides data on the age of crafts organizations. The ranges in which data were collected do not coincide with the breakouts for other disciplines. However, dating back to the fifties or earlier, the crafts membership organization represents a discipline group with organizations older than those of many other disciplines within the visual arts. The graph shows a curve that has steady growth through the sixities and the first half of the seventies, rather than the recent upswing seen in other disciplines. There appears to be some leveling off in the formation of new organizations in the seventies. This would imply slowing growth in this discipline. However, these data, given in ranges, do not provide any concrete picture. Furthermore, since the number of organizations that have gone out of business is unknown, the picture is incomplete.

SPONSORS/PRESENTERS

Up to this point, data have been presented and discussed, on a discipline by discipline basis, that describe, to the extent possible, the arts-producing organizations that make up the arts universe. As discussed earlier, the distinction between producing and presenting is an important one to make when trying to measure the total dollar value of artistic output, and is one of function: the producers are the manufacturers of the artistic product, while the presenters are the distributors of that product. This distinction is also important to bear in mind from an economic standpoint when comparing the arts to other national industries.

IMPUTATION OF TOTAL DOLLARS
CRAFTS MEMBERSHIP ORGANIZATIONS - 1978

Mathematica Survey Data			Imputation of Total Dollars		
Range of Budget Size	Percent of Organizations	Calculation of Actual Number of Organizations	Low-Point of Range	Mid-Point of Range	High-Point of Range
Under - $1,000	33.5%	304	$ 152,000*	$ 228,000*	$ 304,000
$1,000 - 4,999	26.1	237	237,000	592,500	1,185,000
$5,000 - 9,999	10.0	91	455,000	682,500	910,00
$10,000 - 24,999	8.9	81	81,000	1,417,500	2,025,000
$25,000 - 49,999	6.2	56	1,400,000	2,100,000	2,800,000
$50,000 - 99,999	6.5	59	2,950,000	4,425,000	5,900,000
$100,000 - 499,999	7.9	72	7,200,000	18,000,000	36,000,000
$500,000 -and over	.8	7	3,500,000	4,200,000*	5,250,000*
	99.9%	907	$15,975,000	$31,645,500	$54,374,000

plus nonrespondents +311 at $1,000 - $5,000 = $311,000 - $1,555,000

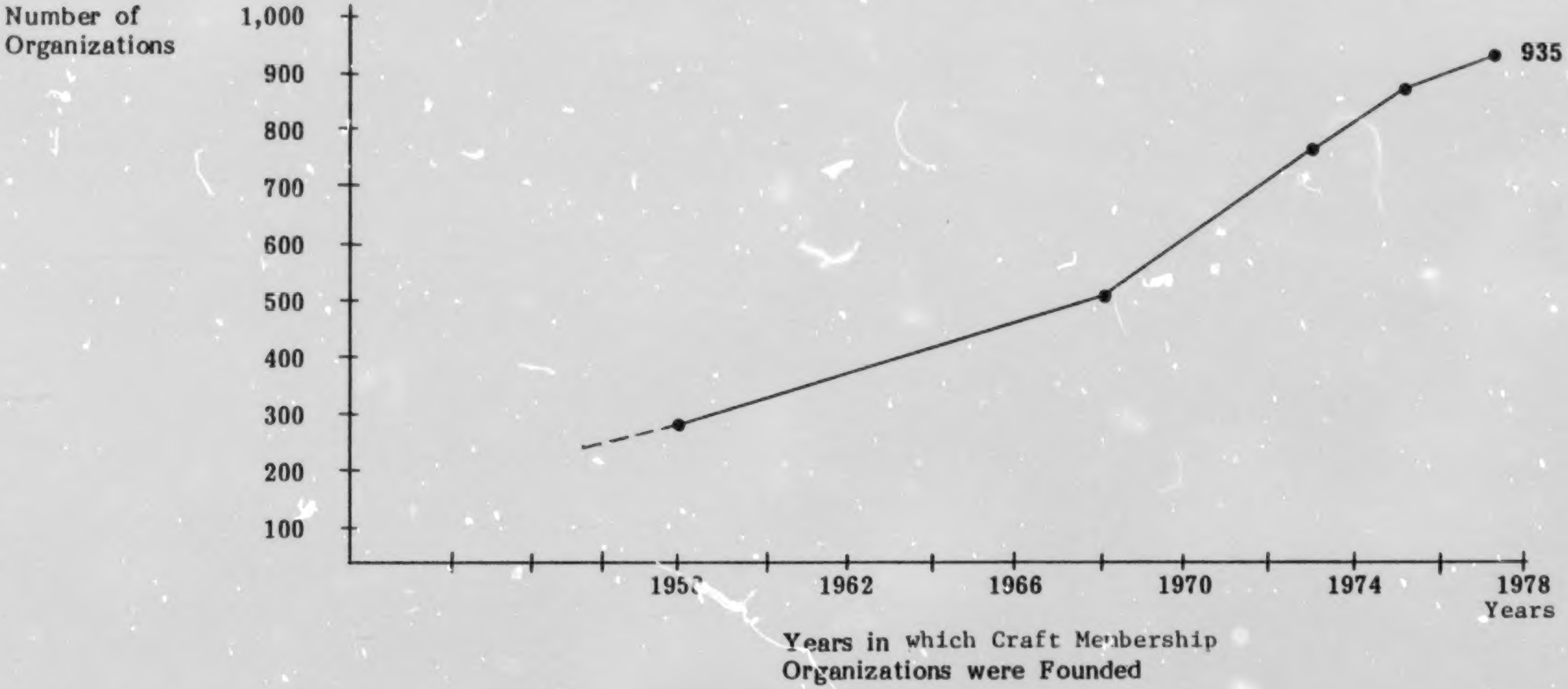
Total 1,218 organizations at $31,956,500 - $33,200,500

*For "Range of Budget Size" = under $1,000, Low-Point set at $500 and Mid-Point set at $750.
For "Range of Budget Size" = $500,000 and over, Mid-Point set at $600,000 and High-Point set at $750,000.

Source of Data: Mathematica Policy Research. 1978 National Survey of Crafts Membership Organizations.

FIGURE 3-54

NUMBER OF CRAFTS MEMBERSHIP ORGANIZATIONS IN OPERATION IN 1978
(Age of Crafts Organizations)



Years in Which Crafts Organizations Were Founded	Number of Organizations
1976 - 1978	54
1974 - 1975	91
1969 - 1973	280
1958 - 1968	232
pre-1958	278
	935

Source of Data: Mathematica Policy Research. 1978 National Survey of Crafts Membership Organizations.

FIGURE 3-55

The sponsor/presenter segment of the arts community must be described separately from the rest of the universe because it is not the direct producer of the product. Their artistic "output" is actually that of the producing organizations they sponsor or present. Including the sponsors/presenters in the production universe results in double counting of dollars. However, when measuring the number of organizations involved in bringing the arts to the public or otherwise promoting them, it is important to account for them.

To define the universe along functional lines, one must have access to data that describe the organizations in that way. Most data sources have not done so. This is because, with the exception of a few categories of organizations whose sole function is as presenters or sponsors, most sponsor/presenters exist for other reasons as well. In fact, the biggest group of presenters are colleges and universities, whose primary function is not arts related. Many arts producing organizations also present other arts groups, both within and outside their own artistic disciplines.

Therefore, clearly classifying an organization as a producer or a sponsor/presenter for the purposes of measuring the universe is difficult. To build a universe, one must be able to measure mutually exclusive organizations in order to calculate totals. Because of this functional problem, the only way to do so is to describe organizations in terms of their primary function and to classify them accordingly. Therefore, in constructing the sponsor/presenter universe, one is forced to leave out large categories of organizations if overlap is to be avoided.

Since most of our data sources are related to disciplinary classifications, it is difficult to find discussions of the sponsorship/presentation function. Most of the disciplinary data sources include both producers and sponsors in their respective universes and do not limit themselves to organizations whose primary disciplinary focus is the same as that of the data source. Therefore, the overlap problem is compounded when trying to distinguish the sponsorship/presentation function from the production function.

It should also be noted that whole categories of organizations that have already been described under separate disciplinary discussions may well include large numbers of sponsors/presenters, e.g., new arts spaces, any number of performing arts groups. However, the extent to which the overlap occurs is not evident from the data. Actually, in a larger sense, museums and galleries are presenters of visual arts and objects, as opposed to being producers. They are also frequent presenters of the performing arts, and there are a few limited data sources that describe this function.

Direct sponsorship/presentation of the arts (both performing and visual) is being done by arts centers, performance facilities, foundations and societies (some specifically created for this purpose), museums, higher education institutions, and public and private arts councils/agencies and by other organizations whose primary purpose is not related to the arts (recreation departments, social service groups, hospitals, etc.).

Limited data are available on the presentation of performing arts by museums, and slightly more useful data are available on such a presentation by colleges and universities. The 1976 NRCA study gives a few figures for performing arts presenters and arts centers and for a visual arts category that contains both presenters and producers. There are some figures available on the number of theatrical facilities and outdoor theater festivals, etc., that existed in mid-decade. Some data are also available on community arts agencies, but again, they are multi-functional, and little identification of the organizations represented is included. We suspect that the overlap of organizations between data sources is severe and is not really measurable in most cases. Thus, no figures on sponsors/presenters are included in this chapter. A full discussion on sponsors/presenters was submitted under separate cover and is included as Appendix F.

THE ARTS AND CULTURAL UNIVERSE: MUSEUMS & PRODUCING ORGANIZATIONS

The previous sections provide universe counts of organizations and total dollars for each of the disciplines of arts and cultural organizations. This section adds those counts together, eliminates any known overlap among the disciplines, and arrives at a total number of organizations and dollars (measured by total expenses) for this universe of arts and cultural organizations.

The total universe count is obviously only a rough estimate, for certain types of organizations are missing. In Chapter 2, a classification of the types was presented (Figure 2-2). Figure 3-56 compares the theoretical classification with the de facto classification that evolved in trying to construct the universe (this is the sum of the disciplines presented in this chapter). Figure 3-56 shows the types of organizations about whose inclusion we are not sure. For those types of organizations for which there are counts, the likelihood is that the figures presented underestimate rather than overestimate the true number. However, the total dollar figure is probably close to reality, because larger organization data are captured almost completely.

Figure 3-57 provides the counts on the full universe. Thus, our best count[29/] is that there are between 19,000 and 20,000 arts organizations/groups, at an economic size of $1.9 to $2.0 billion.

[29/] Recognizing the elusiveness of these numbers, we welcome any and all attempts to determine more accurate counts. We suspect that performing this exercise on the decade of the eighties will be far easier and the data will be much less soft because interest in finding and counting arts organizations is far more widespread than it was in the early seventies.

COMPARISON OF THEORETICAL CLASSIFICATION OF ARTS AND DE FACTO CLASSIFICATION

Performing Arts		Visual Arts, Museums and Literature		Sponsors and Education
Theoretical Calssification From Figure 2-2	De facto Classification From Chapter 3	Theoretical Classification From Figure 2-2	De facto Classification From Chapter 3	
Symphony Orchestra	Orchestra	Art Museum/Gallery	Museum	
Chamber Orchestra		Childrens/Junior Museum		
Opera Company	Opera	General Museum		
Concert Opera Company	Some under Orchestra, some under Opera	History Museum		Not included as specific types in de facto classification, although some probably included as undetected overlap.
Musical Theater Company	Theater	Science Museum		
Resident Theater Company		Park Museum/Visitor Center		
Children's Theater Company		Specialized Museum		
Community Theater Company		Other Museum		Performance Facility
Other Theater Company		Library/Archive	Not included anywhere	Exhibition Space (not Museum or New Arts/Alternative Space)
Ballet Company	Dance	New Arts/Alternative Space	New Arts/Alternative Space	
Modern Dance Company		Craft Membership Organ.	Craft Membership Organ.	Fair/Festival
Folk/Ethnic Dance Company		Artists' Space or Collaborative	Some under New Arts/Alternative Space	Art/Cultural Center
Jazz Dance Company		Audio/Film/Video Producer	Media Arts Organizations	Sponsor of Performing Arts (not Facility or Performing Group)
Other Dance Company				
Choral Group	Choral Music	Radio/TV Broadcaster	Not included anywhere	Performing Arts School
Chamber Ensemble (not Orchestra)	Chamber Music	Media Arts/Film Center	Media Arts Organizations	Visual Arts School
Jazz Music Group	Under other Music	Small Press	Literature (distributors probably not included)	Other School for the Arts
Mime Group	Under Dance	Literary Magazine		Other Arts Education Organization
		Review Journal		* * * * *
Multi-or Interdisciplinary Performing Group	No specific data, maybe some included under "Other Music"	Distributor of Literary Works		Arts Departments of Higher Educational Institutions are generally well covered under respective disciplines of Orchestra, Opera, Theater, Dance, Museums, Media Arts Organizations, and Literature.
Other Performing Group		Other Literary Organization		
		Other Organizations in Visual Arts	Not included anywhere	

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FIGURE 3-56

THE ARTS AND CULTURAL UNIVERSE: MUSEUMS AND PRODUCING ORGANIZATIONS

		Fully Professional/Larger Organizations			All Organizations/Groups	
Year of Data	Discipline	Number of Organizations	Total $ (000's)	Criterion For Inclusion	Number of Organizations	Total $ (000's)
1980	ORCHESTRA (Figure 3-7)	176	252,134	$100,000	1,505	237,599
1980	OPERA (Figure 3-16)	109	133,600	$100,000	779	148,900
1977	THEATER (Figures 3-21, 3-31) 1980 Data for "Fully Professional"	300	116,600	potential constituency of TCG	5,545	238,896
1980	MUSICAL THEATER (Figure 3-32) 1977 data for "Fully Professional"	71	64,381	NOI Universe	included in Theater	
1978	DANCE (including Mime) (Figure 3-41)		?		460	60,000
1980	CHORAL MUSIC (Figure 3-43)	98	14,210	APVE profes. or profes. church	1,100	22,487
1980	CHAMBER MUSIC (Figure 3-44)		?		1,000	13,940
1977	JAZZ MUSIC & OTHER PERFORMING ARTS (in text, no figure)		?		214	75,043
SUBTOTAL: PERFORMING ARTS		Too many missing			10,603	832,865

Figure 3-57

Page 1 of 2

THE ARTS AND CULTURAL UNIVERSE: MUSEUMS AND PRODUCING ORGANIZATIONS (Continued)

		Fully Professional/Larger Organizations			All Organizations/Groups	
Year of Data	Discipline	Number of Organizations	Total $ (000's)	Criterion For Inclusion	Number of Organizations	Total $ (000's)
1979	MUSEUMS (Figures 3-45, 3-46, and 3-47)	1,396	934,375	$100,000	4,408	1,016,793
1978	NEW ARTS/ALTERNATIVE SPACES (Figure 3-50)		?		500	11,700
1978	MEDIA ARTS ORGANIZATIONS (in text, no figure)		?		500	10,000
1980	LITERATURE (in text and Figure 3-51		?		2,500	37,500
1978	CRAFTS MEMBERSHIP ORGANIZATIONS (Figure 3-54)	80	22,200	$100,000	1,218	33,200
SUBTOTAL: MUSEUMS, VISUAL ARTS, AND LITERATURE		Too many missing			9,126	1,109,193
TOTAL: MUSEUMS AND PRODUCING ORGANIZATIONS					19,729	$1,942,058

FIGURE 3-57 (Continued)

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CHAPTER 4

FRAMEWORK FOR ANALYSIS OF ECONOMIC BEHAVIOR OF ARTS ORGANIZATIONS

The arts organizations covered in this study[1/] are in the not-for-profit sector. As such, their goal is not profit maximization but the dissemination of their services to the widest audiences, subject to (1) their individual budget constraints and (2) their maintenance of or increase in the present quality of their productions or services. For example, a symphony orchestra is not likely to switch to popular music, even though that could increase its audience immensely. Furthermore, to maintain not-for-profit status (i.e., income tax exempt) from the Internal Revenue Service, an organization must (1) continue to provide goods and/or services that are within the scope of activities for which it was granted tax exempt status and (2) not show a large profit from its activities over time.

Arts organizations derived earned income from ticket sales, admissions income, sales of art objects/products, and other direct receipts from performances, exhibitions, and other arts events. The amount of earned income is limited in the performing arts by the number of performances live performers can give during a particular time period and the seating capacity of the halls in which the performances are given. In museums and the visual arts, the capacity of an exhibition is not as strictly defined, but capacity constraints do exist. Hence, to increase its earned income, an arts organization usually must increase ticket prices or fees. If expenditures were to be covered solely by earned income, the arts might be priced out of reach of many customers, and attendance would be limited to a select group. If the goal is to attract large, diverse audiences, an arts organization will hesitate to raise all prices even when it is profitable. This sentiment is expressed in the following excerpts from a letter to subscribers by the general director of the New York City Opera, Beverly Sills.

> I've always believed that the arts are for everyone and that opera is not just for the elite. I knew I had to do something. So, as of today, I am cutting the cost of all City Opera subscriptions by 20% across the board.

[1/] For a broader development of the economic behavior of arts organizations, see Appendix D.

> In the Spring of 1981, we raised our prices. We made money, but lost people. This season, we will finish $600,000 ahead at the box office, but our audiences who come to see our terrific young artists are down each night by 7 to 8%. I know what it feels like to look out on an audience and see empty seats, and this spring we want all of our opera lovers back in them. . . . We're cutting back our prices so that everybody can afford to enjoy our performances.2/

Since earned income is insufficient to cover costs, income must be generated from another source. As members of the nonprofit tax-exempt sector, arts organizations also have unearned (also called contributed or support) income. Contributed income can come from both the private and the government sectors and, from an economic view, takes two forms. Most comes from contributions or grants to be used during the period of its donation; the other is in the form of earnings derived from long-term contributions, or endowments. Although endowment earnings (usually investment dividends and interest) are treated as earned income by accountants, conceptually they are simply a long-term stream of contributions. When a donor contributes capital for an endowment fund, he is really setting up a mechanism whereby a contribution is made annually to the organization, in the form of earnings on the endowment, irrespective of whether he personally owns the fund and makes the contribution annually or makes all the annual contributions in advance by donating the fund to the organization. Hence, from an economic viewpoint, these endowment earnings are to be considered contributions to the organization.

In past studies and in some current data bases, another form of contributions is included: the endowment corpus principal that is transferred to operations to reduce a deficit, i.e., an invasion of endowment capital. Even though this is derived from long-term contributions, it should not be treated as income. To understand why, a short digression into fund accounting is necessary. Data on the arts historically have looked at the operating fund only and have measured the income and expenses of the daily operations of the arts organization. However, most older, larger arts organizations account for their endowment and other restricted funds and (for those organizations that own a building) their physical plant in separate accounting entities called funds. Since data collections have measured only the operating fund, any

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2/ New York Times, November 11, 1981, p. c27.

incoming funds to the operating fund used to offset expenses (i.e., those transferred from other funds to the operating fund) had to be considered income, even funds that were endowment principal used to meet a deficit in the operating fund.

This explains why, in some data collections, some organizations have reported deficits for many years in a row without the organization dying. Although this view of the operating fund only is a fictitious view of reality, as a practical matter in the performing arts this problem is insignificant except for orchestras (endowments were small in those few other performing arts organizations in which they existed in the 70s). In the orchestra field, a few endowments were of significant size. The problem is not insignificant in museums, however, and with the current push in all artistic disciplines to build endowments where possible, this issue is becoming universal to all the arts.

To properly observe economic behavior, one would want to view the entire organization entity and disregard the division of funds into (arbitrary) fund accounts. In that case, the endowment principal would be recorded as income when received by the organization from the donor and would be considered part of net worth or the reserves of the organization. It would generate income (dividends from stock, interest from bonds, etc.) that would be recognized as contributed income in the relevant year. If the organization incurred a deficit from its operations, it would draw down its reserves or net worth to cover the deficit. (This is in fact exactly what a transfer or invasion of endowment principal really is, merely a paper transaction from one fund to another.)

Returning to the overall budget constraint, each arts organization must balance its expenditures, earned income, and contributions--not necessarily on a year-by-year basis, but on a long-run basis; i.e., it cannot allow its deficit to accumulate indefinitely. It should be noted that this long-run balancing may span several decades, when the organization has reserves in the form of endowment corpus. For example, in the past 15 years, the major orchestras have been closing their deficits by dipping into their accumulated endowments. We have a system, then, where earned income, unearned income, and expenditures, as well as their components, are simultaneously determined, subject to the nonprofit budget constraint. Consequently, a change in any component is not an isolated event, but affects other components. Our mode of analysis allows us to analyze the system as a whole, as well as the behavior and determinants of the components of the system, but the focal point of our analysis is the gap between expenditures and earned income, discussed more fully in the following section.

THE EARNINGS GAP AS THE CENTER OF ANALYSIS

In their economic analysis of the performing arts, Baumol and Bowen[3/] introduced the concept of ever-increasing need for support of performing arts organizations. Ever since, analysis of the arts has focused on the earnings gap:[4/] the difference between expenditures and earned income. The Ford Foundation stated that it is a "fact, well-known to professionals in the field, that the labor-intensive performing arts, whose productivity cannot keep pace with the ever-increasing productivity of the industrial economy in which they exist, are faced with an ever-increasing gap between their operating costs and their earned income. The costs, principally wages, are set by the cost level of the economy; the earned income is limited by the inherent limit on the number of performances live performers can give and the number of seats in the halls.[4a/]

An example of what happens to the earnings gap with a 5 percent annual gain in productivity over a 10-year, non-inflationary period is shown in Figure 4-1. The gap widens from $10,000 to $37,600, increasing by more than 300 percent over the 10 years. The price of tickets does not rise in this example, because productivity gains do not translate into a general rise in prices elsewhere in the economy.

[3/] Baumol, William J., and Bowen, William G. Performing Arts--The Economic Dilemma. Twentieth Century Fund, 1966.

[4/] The term earnings gap was coined by the Ford Foundation. Baumol and Bowen referred to it as the "income gap." The Ford Foundation.

[4a/] The Finances of the Performing Arts, Vol. 1, 1974. p. 7.

The Widening Earnings Gap: An Example * (In $000)

	Y_1	Y_2	Y_3	Y_4	Y_5	Y_6	Y_7	Y_8	Y_9	Y_{10}
Total Expenses	50	52.5	55.1	57.9	60.8	63.8	67.0	70.4	73.9	77.6
Total Earned Income	40	40	40	40	40	40	40	40	40	40
The Earnings Gap	10	12.5	15.1	17.9	20.8	23.8	27.0	30.4	33.9	37.6

* Based on a 5 percent annual productivity gain in the general economy

FIGURE 4-1

While the central proposition of the Baumol and Bowen study--the natural tendency of the earnings gap to widen as the "inescapable result of the technology of live performance"[5]--is certainly correct, it covers only a part of the story. We must also take into account the widening of the gap due to an increase in output.

A simple example will illustrate. Suppose an arts organization has 10 performances annually with expenditures of $50,000, earned income of $40,000, and a gap of $10,000. It now doubles its season to 20 performances, and for the sake of simplicity, its expenditures increase to $100,000, its earned income to $80,000, and its gap to $20,000. We have, then, a doubling of the gap without any increase in artistic wages as a result of productivity gains elsewhere in the economy.

If we now take the Baumol and Bowen thesis to its logical conclusion, it should be restated as follows: At the same level of output, there is a natural tendency for the earnings gap to widen as a result of the technology of live performance, allowing for only limited increases in productivity. This we shall call its natural growth. In addition, any increase in the output will also increase the earnings gap. This implies that any measure of the growth rate of the earnings gap contains two elements, its natural growth and its growth due to an increase in output, which we shall call its output growth. Hence, in order to measure the natural growth of the earnings gap, output must remain constant. Indeed, this is the true measure of the underlying growth rate that the logical structure of the Baumol and Bowen thesis dictates. Figure 4-2 provides a picture of the two components of growth of the earnings gap and their combination.

It should be noted that output in the arts not only consists of the number of performances, a "quantity" dimension, but also has a "quality" dimension. A Beethoven symphony played by the Chicago Symphony Orchestra is not identical to the same symphony played by a high school orchestra. Some determinants of quality

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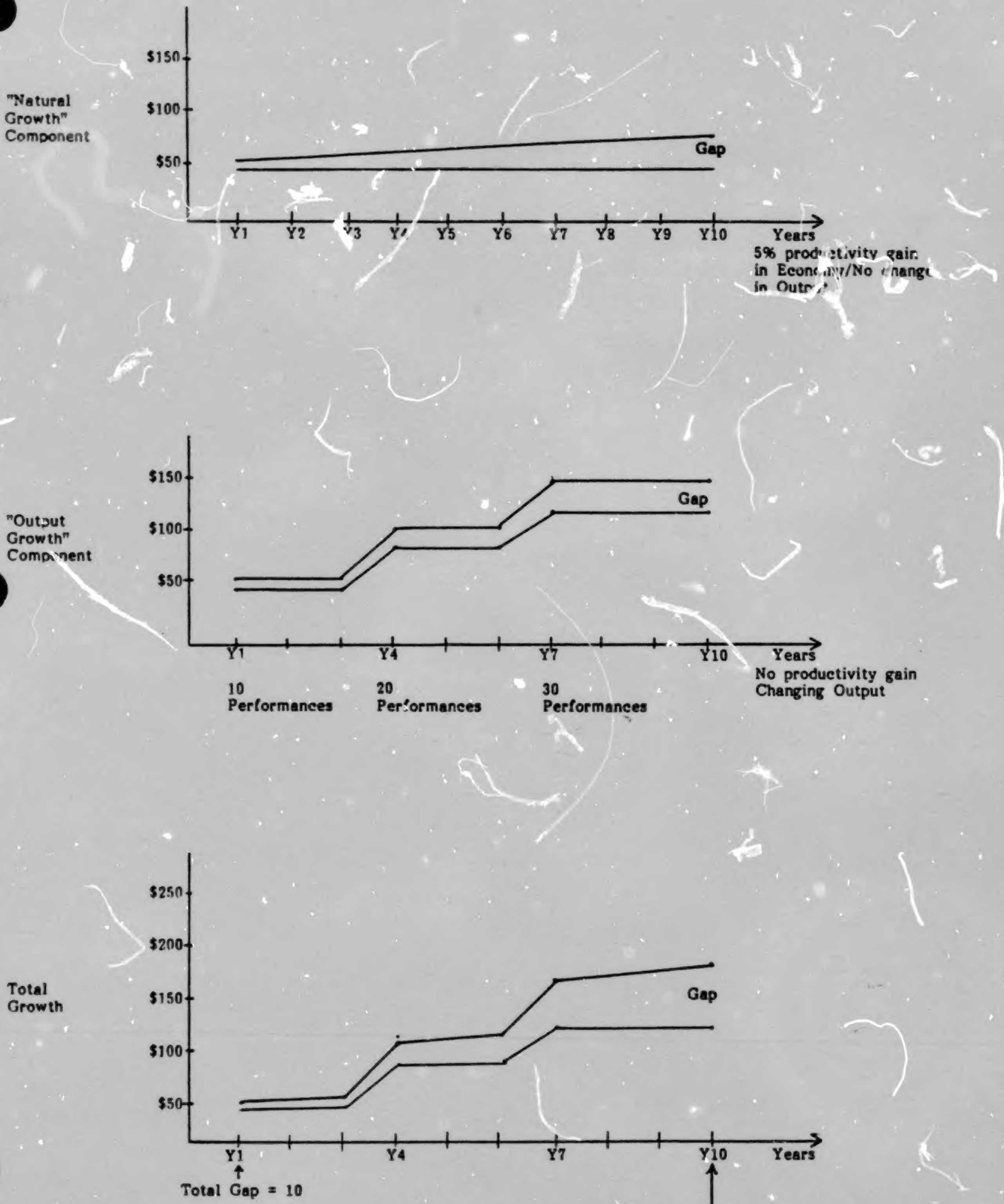
[5] Op .cit. p. 162.

The Components of the Earnings Gap



Natural Component = 28
Output Component = 20
Initial Gap = 10
Total Gap = 58

FIGURE 4.3

are the number of players, the quality of the players, the amount of rehearsal time, and even the physical setting of the performance. Given a constant level of earned income, an increase in output will increase the earnings gap even in the absence of natural growth. This is the second segment of the growth of the earnings gap.

Limits to Growth of the Earnings Gap

Having seen that there are two segments to the growth of the earnings gap, the question arises whether there exist limits to their growth. The next section traces the arguments of limits of growth and, therefore, may be too technical for many readers.

Natural Rate of Growth. The underlying logic of the Baumol-Bowen thesis is that artistic labor costs must rise as a consequence of productivity increases in the rest of the economy, with virtually no increase in the arts sector. If so, the (natural) rate of growth of real artistic labor costs[6/] can be no greater than that of productivity in the economy at large. This has an impact on the natural rate of growth of the earnings gap.

Suppose an arts organization has total expenditures (E), artistic personnel costs (APC), and an earnings gap (G).

Furthermore,

$$G = \frac{1}{k}E \qquad k \geq 1 \qquad (1)$$

$$APC = \frac{1}{c}E \qquad c \geq 1 \qquad (2)$$

where $\frac{1}{k}$ is the ratio of the earnings gap to total expenditures and where $\frac{1}{c}$ is the share of expenditures going to artistic personnel costs.

[6/] Money wages in the economy can and do grow much faster than productivity, and artistic wages follow, though sometimes with a considerable lag.

Now suppose that productivity in the rest of the economy grows at an annual percentage rate r. In order to measure the natural growth rate (NGR), a constant level of output and earned income must be maintained.

Then, if the growth rate is denoted by g, it follows that

$$g\,(APC) \leq r \tag{3}$$

$$g\,(E) \leq \frac{r}{c} \tag{4}$$

$$g\,(G) \leq k\frac{r}{c} \tag{5}$$

If so, equation (5) indicates that the natural growth rate has an upper bound,

$$\max NGR = \frac{k}{c}\,r \tag{6}$$

This is not a constant bound, however. As productivity increases in the rest of the economy, $\frac{k}{c}$ also varies. It follows from equations (1) and (2) that

$$\frac{k}{c} = \frac{APC}{G} \tag{7}$$

As productivity grows at rate r, APC and consequently G are both increased by equal increments. It is well known that if both the numerator and the denominator are increased by an equal amount,

$$\left[\frac{k}{c}\right]_{t+1} \gtrless \left[\frac{k}{c}\right]_{t} \text{ if } \frac{k}{c} \lesseqgtr 1 \tag{8}$$

Thus, from whichever point one begins,

$$\lim_{t \to \infty} \frac{k}{c} = 1 \tag{9}$$

and consequently,

$$\lim_{t \to \infty} \max NGR = r \tag{10}$$

Hence, if output and earned income remain constant, the long-run natural growth rate is the same as the rate of productivity growth in the rest of the economy.

Furthermore, NGR is not constant but changing--usually declining. When an arts organization is created, it generally does not begin with a relatively large gap. For example, for the 17 Major orchestras (see Chapter 5), the earnings gap was only 38 percent of total expenditures in 1949-50, but in 1969-70, it had climbed to 52 percent.[7] This is not always the case, however. For example, some ballet companies began with mostly contributions, i.e., an extremely large gap. Hence, from equation (7), $\frac{k}{c}$ and consequently NGR are relatively large. However, as time progresses and the gap grows, $\frac{k}{c}$ and NGR continuously decline until they reach their respective limits. Thus, if one were to look at an arts organization over time or at different organizations in the cross section, one would find that, in general, older organizations have smaller natural growth rates than do newer organizations.

Output Growth Rate. The growth of the earnings gap as a result of growth of output also has limits. While it appears at first that output can continue to grow--along with the earnings gap--without bound for these organizations, there is a limit to output. For example, a symphony orchestra already employing all of its players for 52 full weeks a year cannot expand much. It can split into smaller groups of players, e.g., a chamber orchestra, but not for long, for then we have a group of bands rather than a symphony orchestra. This is not so obvious for organizations that have neither a fixed group of players nor fixed attendance capacity. For example, many theaters do not have permanent casts and perform in several auditoriums simultaneously. Although there exists more room for expansion in such cases, eventually there is a limit beyond which the organization loses its unique characrer, for management and artistic direction cannot be duplicated. This leads to an important implication.

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[7] See Schwarz, Samuel, and Greenfield, Harry I. A Model for the Analysis of the Performing Arts: A Case Study of the Major Orchestras. Center for Policy Research, 1977. p. 108.

Because it is the goal of arts organizations to disseminate their services to as wide an audience as possible, subject to budget and quality constraints,[8] a young organization tends to expand quickly and consequently has large rates of growth in its earning gap. Over the years, as the organization becomes more established, limits on the growth of output set in, and the growth rate of the earning gap slackens. Thus, over time, the output growth rate (OGR) diminishes and

$$\lim_{t \to \infty} OGR = 0 \qquad (11)$$

Furthermore, as output increases, differential economies of scale cause the artistic personnel share of total expenditures, l/c, to decline (see Appendix E) and, hence, lead to a smaller natural growth rate. Indeed, this is one element that has tempered the growth of the earning gap over the years.

Total Growth of the Earnings Gap. It follows from the previous discussion and equations (10) and (11) that the long-run growth rate of the total earnings gap,

$$\lim_{t \to \infty} \max g(G) = \lim_{t \to \infty} \max NGR + \lim_{t \to \infty} OGR = r \qquad (12)$$

or the rate of productivity growth in the rest of the economy.

So far, only pure growth, i.e., holding earned income fixed, has been discussed. It is obvious that as earned income is increased, the size of the gap is decreased. For example, if an organization has a policy of increasing earned income so that it keeps up with the rise in costs (the second example in Figure 4-1), i.e., at the rate of r/c, then the natural growth rate can become

$$NGR \leq \frac{r}{c} \leq k\frac{r}{c} \qquad (13)$$

It should be noted, however, that despite evidence of inelasticity of demand for their services,[9] arts organizations hesitate to raise prices because of their goal to attract a large audience. Otherwise, they would cut back output and be profit maximizers. A case in point is the recent action by the New York City Opera outlined in the excerpts from Beverly Sill's letter to subscribers quoted earlier in this chapter.

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[8] Schwarz and Greenfield, op. cit. p. 18.

[9] Baumol and Bowen, op. cit. pp. 274-276.

There is an additional reason for variation even in the long-run growth rate of the earnings gap. Our analysis, thus far, has been based on a constant rate of growth of productivity in the rest of the economy. But r can vary over time. For example, in recent years there has been a decline in r. Its effect in slowing the growth of the earnings gap--and hence, in reducing problems for arts organizations--has been pointed out by Baumol and Baumol.[10/] With a smaller growth of productivity in the general economy, the basic driving force that creates the earnings gap—the difference in productivity between the arts sector and the general economy--has diminished.

Having analyzed the components of the growth of the earnings gap and their relative magnitudes, the natural question arises: what allows this growth to continue? Obviously, an organization cannot incur a deficit for very long, and this points to the contributions that must fill the gap. Without them, output cannot grow and even the natural growth of player wages cannot be met. The next section looks at contributions leading to a new interpretation of the earnings gap.

Interpreting the Earnings Gap

Researchers have usually looked at only one side of the coin—growth of costs, forgetting that the other side consists of contributions. Without contributions, there is no earnings gap. If, for example, a donor contributes $1 million to an arts organization, its earnings gap can be increased by $1 million. On the other hand, when contributions slacken, the organization is forced to contract and decrease the gap. This points to a new interpretation of the earnings gap.

[10/] Baumol, Hilda, and Baumol, William J. "On Finances of the Performing Arts During Stagflation: Some Recent Data." Journal of Cultural Economics, 4(2):1-14, December 1980.

Traditionally, the total national earnings gap of the (performing) arts has been interpreted as "the amount which, at the present time, society must be prepared to contribute, by some means, if the nation's existing performing arts organizations are to be kept solvent."[11/] Thus, projections of large growth rates of the earnings gap have served as the rationale for more support for the arts especially from government.[12/] Using this reasoning, it would imply that projection of a smaller growth rate indicates less need for support of the arts.

Our previous analysis indicates that precisely the contrary is usually true. Growth rates of the earnings gap above the natural growth rate indicate an expansion of the arts and are a sign of good health, while those below the natural growth rate can be an indication of contraction and poor health for the arts.[13/]

This expansion and contraction can take the form of changes in both quantity and quality. For example, let us look at what has happened in the live professional theater. In the foreword to the Theatre Communications Group 1980 membership survey, Theater Facts 80, Ruth Rothschild Mayleas (former Director of Theater Programs for the National Endowment for the Arts) interviewed several directors of resident theaters. Concerning Arena Stage, Washington, D.C., and its Producing Director, Zelda Fichandler, Ruth Mayleas writes:

> Rapidly expanding costs without new financial development create other problems. Next season, for the first time, Arena will not be able to do as many large plays. For a director so deeply concerned with shaping the repertoire, this is a major issue. Fichandler has never before let financial pressures influence repertoire, but now she finds no other choice. If one looks back, the economic effect on production has already been felt: In 1967 Arena's "The Great White Hope" was done with 62 actors and 237 costumes. That production would be impossible today, says Fichandler. In looking ahead to the time when the present group of senior actors leave, she sees no one to replace them; there are not many mature actors now who want to commit to a company.[14/]

[11/] Baumol and Bowen, op. cit. pp. 150-151.

[12/] See Ford Foundation, op. cit. p. 104.

[13/] This is not always the case when there are changes in earned income or there is a deficit.

[14/] Mayleas, Ruth Rothschild. "Foreword." Theater Facts 80. Theatre Communications Group, 1981.

Likewise, about the Mark Taper Forum, Los Angeles, and its Artistic Director, Gordon Davidson, comes the following:

> At present, according to Davidson, new play activity for work that is unsuited to the main stage has dwindled because it is too costly--full productions in a 99-seat laboratory theater are simply not economically feasible. In other vital growth areas, the Taper has not been able to increase actor salaries or institute an extra week of rehearsal.[15/]

These two examples personify what Anderson and Maltezou described in 1977: "Smaller casts, smaller orchestras, . . . fuller houses, larger houses, lower salaried casts, sparser sets." While they called this "economizing" and stated that they have "no way to judge the extent to which the economic condition of the theater has been maintained and/or improved at the expense of artistry,"[16/] this was, in great part, a decrease in output. Of course, if we leave the vegtables out of the soup, we have economized. Only we now have hot water and not soup.

Our expansion of the Baumol and Bowen thesis has closed the gap between the theory and empirical observations while strengthening the underlying logic. Our dissection of the growth of the earnings gap and the resultant interpretation of the earnings gap has led to some major conclusions and policy implications:

- Any growth of the earnings gap greater than the natural growth rate may be a sign of good health for the arts. Thus, a large growth of the earnings gap need not necessarily be interpreted as a sign of poor conditions.

- Within the same class of organizations, older, more established arts organizations, in general, have smaller growth rates than newer, less established ones.

[15/] Ibid.

[16/] Anderson, Robert J., Jr., and Maltezou, Sonia P. "The Economic Condition of the Live Professional Theater in America." Research in the Arts: Proceedings of the Conference on Policy-Related Studies of the National Endowment for the Arts. The National Endowment for the Arts, Washington, D.C., and the Walters Art Gallery, Baltimore 1977. p. 64.

- The earnings gap can grow only if there are contributions to fund that growth. If we want to obtain a comprehensive analysis of the condition of the arts, we must take a closer look at the growth of contributions and its relationship to the earnings gap.

The earnings gap, then, is the focal point of our analysis. It serves as the starting point from which we study the various elements that influence its growth. Then we see what effects those elements had on its growth. The earnings gap is our thermometer for the arts. In the next chapters, we turn to measurement of its growth as well as of the variables that influence it.

CHAPTER 5

SYMPHONY ORCHESTRAS

Of the performing arts, symphony orchestras have the earliest organizational roots in the United States. The symphony field has by far the most detailed, reliable, and consistent data over the entire decade of all the art forms. For this reason, the orchestras serve as the model of this study, as they have for previous studies.

The Sample and The Data

Most of the larger (expenditures over $500,000) orchestras and many smaller orchestras submit standardized data annually to the American Symphony Orchestra League (ASOL). The largest orchestras were classed in 1978-79 as Major orchestras (those with expenditures of $2 million and over), Regional orchestras, an intermediate category initiated in 1975-76 ($500,000 to $1,999,999), and Metropolitan orchestras ($100,000 to $499,999). Over the decade 1969-70 to 1978-79, 143 orchestras submitted data for at least one year: 31 Majors, 29 Regionals, and 83 Metropolitans. The number of organizations responding varied from year to year, however. In the year with the greatest response, 1978-79, all the Majors, 26 Regionals, and 63 Metropolitans responded.

Figure 5-1 lists the number of orchestras in each classification that reported in each year of the decade.

Number of Orchestras Reporting
To the American Symphony Orchestra League

	1970	71	72	73	74	75	76	77	78	79
Majors	30	28	30	29	31	31	31	31	31	31
Regionals	24	25	21	23	21	24	25	28	27	26
Metropolitans	26	36	39	32	43	50	48	59	60	63

FIGURE 5-1

Because the ASOL data are very detailed, data bases for several sub-groups were set up as follows and as named in Figure 5-2:

(1) "17 Major" orchestras for 1969-70 to 1978-79. This group consists of the Baltimore, Buffalo, Chicago, Cincinnati, Cleveland, Dallas, Houston, Indianapolis, Los Angeles, Minnesota (formerly Minneapolis), National (formerly Washington), New Orle[illegible]w York, Philadelphia, Pittsburgh, St. Louis, and San Francisco orchestras. They are a good cross-section of major orchestras, in terms of both expenditure levels and geographic location. The reason that these 17 form a group is that data on orchestras in this group exist from 1949-50. This provides an important historical perspective. Data for these orchestras are at the end of the chapter in Tables 5-1 through 5-34.

(2) "31 Major" orchestras for 1969-70 to 1978-79. This group consists of the previous 17 orchestras and others, as shown in Figure 5-2. Over the decade, orchestras did not report data seven times (one in 1970, three in 1971, etc., see Figure 5-1). These were estimated on an orchestra-by-orchestra pattern. Data for the 31 Majors are in Tables 5-35 through 5-61.

(3) "15 Regional" orchestras. This subset of Regional orchestras reported every year during the decade. Data for these 15 Regionals are in Tables 5-62 through 5-75.

(4) "12 Metropolitan" orchestras. This subset of Metropolitan orchestras reported every year during the decade. Data for these 12 Metropolitans are in Tables 5-76 through 5-81.

(5) "29 Regional" orchestras. The missing data for the organizations that did not report were estimated by using the average for those that did report. Data for the total of 29 Regionals are in Tables 5-82 through 5-87.

(6) "83 Metropolitan" orchestras. The missing data for these orchestras were estimated in the same way as were the Regionals. Data for the 83 (all) Metropolitans are in Tables 5-88 through 5-93.

ORCHESTRAS REPORTING TO THE AMERICAN SYMPHONY ORCHESTRA LEAGUE CLASSIFICATION AS OF 1979

31 Major Orchestras (Subsample of 17 shown with an asterisk)

Atlanta Symphony Orchestra
*Baltimore Symphony Orchestra
Boston Symphony Orchestra
*Buffalo Philharmonic Orchestra
*Chicago Symphony Orchestra
*Cincinnati Symphony Orchestra
*Cleveland Orchestra
*Dallas Symphony Orchestra
Denver Symphony Orchestra
Detroit Symphony Orchestra
Honolulu Symphony Orchestra
*Houston Symphony Orchestra
*Indianapolis Symphony Orchestra
Kansas City Philharmonic
*Los Angeles Philharmonic
Milwaukee Symphony Orchestra
*Minnesota Orchestra
*National Symphony Orchestra
New Jersey Symphony Orchestra
*New Orleans Philharmonic-Symphony Orchestra
*New York Philharmonic
North Carolina Symphony Orchestra
*Philadelphia Orchestra
*Pittsburgh Symphony Orchestra
Rochester Philharmonic Orchestra
*Saint Louis Symphony Orchestra
San Antonio Symphony Orchestra
*San Francisco Symphony Orchestra
Seattle Symphony Orchestra
Syracuse Symphony Orchestra
Utah Symphony Orchestra

29 Regional Orchestras (Subsample of 15 shown with an asterisk)

American Symphony Orchestra
*Birmingham Symphony Orchestra
Charlotte Symphony Orchestra
*Columbus Symphony Orchestra
Flint Symphony Orchestra
Florida Philharmonic Orchestra
*Florida Symphony Orchestra
Fort Worth Symphony Orchestra
Grand Rapids Symphony Orchestra
*Hartford Symphony Orchestra
Hudson Valley Philharmonic Orchestra
Jacksonville Symphony Orchestra
Long Beach Symphony Orchestra
*Louisville Orchestra
Memphis Symphony Orchestra
*Nashville Symphony Orchestra
*Oakland Symphony Orchestra
*Oklahoma Symphony Orchestra
*Omaha Symphony Orchestra
*Oregon Symphony Orchestra
*Phoenix Symphony Orchestra
Puerto Rico Symphony Orchestra
*Richmond Symphony Orchestra
Saint Paul Chamber Orchestra
*San Diego Symphony Orchestra
San Jose Symphony Orchestra
*Toledo Symphony Orchestra
Tulsa Philharmonic Orchestra
*Wichita Symphony Orchestra

83 Metropolitan Orchestras (Subsample of 12 shown with an asterisk)

*Akron Symphony Orchestra
*Albany Symphony Orchestra
Albuquerque Symphony Orchestra
Amarillo Symphony Orchestra
Arkansas Symphony Orchestra
Austin Symphony Orchestra
Battle Creek Symphony Orchestra
Boise Philharmonic
Bridgeport Symphony
Brooklyn Philharmonia
Canton Symphony Orchestra
Cedar Rapids Symphony Orchestra
Charleston Symphony Orchestra
Chataugua Symphony Orchestra
*Chattanooga Symphony Orchestra
Colorado Music Festival
Colorado Springs Symphony Orchestra
Corpus Christi Symphony Orchestra
*Dayton Philharmonic Orchestra
Delaware Symphony
Des Moines Symphony Orchestra
Duluth-Superior Symphony Orchestra
Eastern Philharmonic Orchestra
El Paso Symphony Orchestra
Elkhart Symphony Orchestra
Erie Philharmonic Orchestra
Evansville Philharmonic Orchestra
Florida Gulf Coast Symphony Orchestra
Florida West Coast Symphony Orchestra
*Fort Lauderdale Symphony Orchestra
*Fort Wayne Philaharmonic Orchestra
*Fresno Philharmonic Orchestra
Glendale Symphony Orchestra
Greensboro Symphony Orchestra
Harrisburg Symphony Orchestra
Hartford Chamber Orchestra
*Jackson Symphony Orchestra
Johnstown Symphony Orchestra
*Kalamazoo Symphony Orchestra
Kern Symphony Orchestra
Knoxville Symphony Orchestra
Lansing Symphony Orchestra
Lexington Philharmonic Orchestra
Lincoln Symphony Orchestra
Little Orchestra Society
Long Island Symphony Orchestra
Los Angeles Chamber Orchestra
Lubbock Symphony Orchestra
Madison Symphony Orchestra
Marin Symphony Orchestra
Midland-Odessa Symphony & Chorale
Monterey County Symphony Orchestra
*New Haven Symphony Orchestra
New Mexico Symphony Orchestra
Norfolk Symphony Orchestra
Northeastern Pennsylvania Philharmonic Orchestra
Norfolk Symphony Orchestra
Northwest Chamber Orchestra
Orchestra da Camera
*Pasadena Symphony Orchestra
Portland Symphony Orchestra
Queens Symphony Orchestra
*Rhode Island Philharmonic Orchestra
Rockford Symphony Orchestra
Sacramento Symphony Orchestra
Saginaw Symphony Orchestra
Santa Barbara Symphony Orchestra
Savannah Symphony Orchestra
Shreveport Symphony Orchestra
Sioux City Symphony Orchestra
South Bend Symphony Orchestra
South Dakota Symphony Orchestra
Spokane Symphony Orchestra
Springfield (MA) Symphony Orchestra
Springfield (OH) Symphony Orchestra
Suffolk Symphony Orchestra
Tri-City Symphony Orchestra
Tucson Symphony Orchestra
Utica Symphony Orchestra
Vermont Symphony orchestra
Warren Symphony Orchestra
Winston-Salem Symphony Orchestra
Wheeling Symphony Orchestra
Youngstown Symphony Orchestra

FIGURE 5-2

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(7) "143 Major, Regional, and Metropolitan" orchestras. The aggregates of the data for the 31 Major, 29 Regional, and 83 Metropolitan orchestras are in Tables 5-94 through 5-99.

The ASOL data include substantial detail in all financial areas except fund balances and non-operating funds activities. Furthermore, the data are relatively consistent for all years in the decade (and for the 17 Majors for 30 years). This consistency permits far greater analysis of economic changes in this discipline than in any other.

In this chapter, growth rates are presented for each of these groups, although not with the same amount of detail. The 17 Majors are presented first because they provide a 30-year historical perspective. This long-range view provides the underpinnings of the analysis not only of the orchestras but of the entire study.

THE 17 MAJORS

Figure 5-3 shows total expenditures and earned income for the 17 Major orchestras, with the slowly growing earnings gap between them; Figure 5-4 shows the corresponding variables in constant 1970 dollars. These figures portray an almost parallel growth of earned income and expenditures and their slow growth in real terms. In order to understand the nature of this growth, one must first look at the components of expenditures, the earned income, and the contributions that fill the gap.

Expenditures

Table 5-25 shows total expenditures over the decade together with its growth rate in actual dollars[1] and two deflated figures to remove the effects of inflation.

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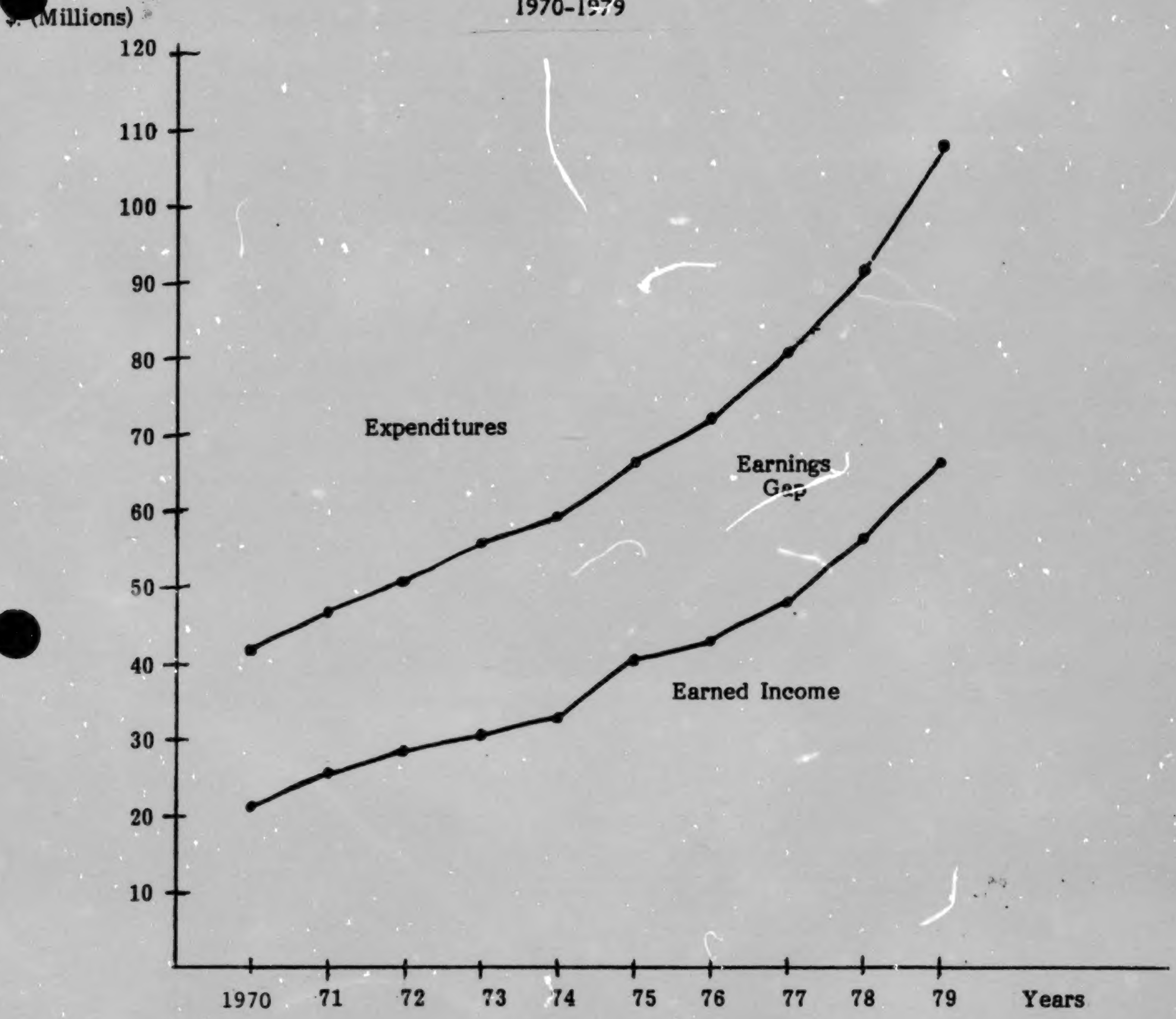
[1] Each of the Tables presents the reported data for the variable on the first line. The second and third lines are the reported data deflated by the Implicit Gross National Product Deflator and by the Consumer Price Index as reported in the yearly volumes of the Economic Report of the President and adjusted for a fiscal year ending June 30. A majority of arts organizations have a fiscal year end during the summer. These two lines of deflated data represent the information with the effects of inflation removed.

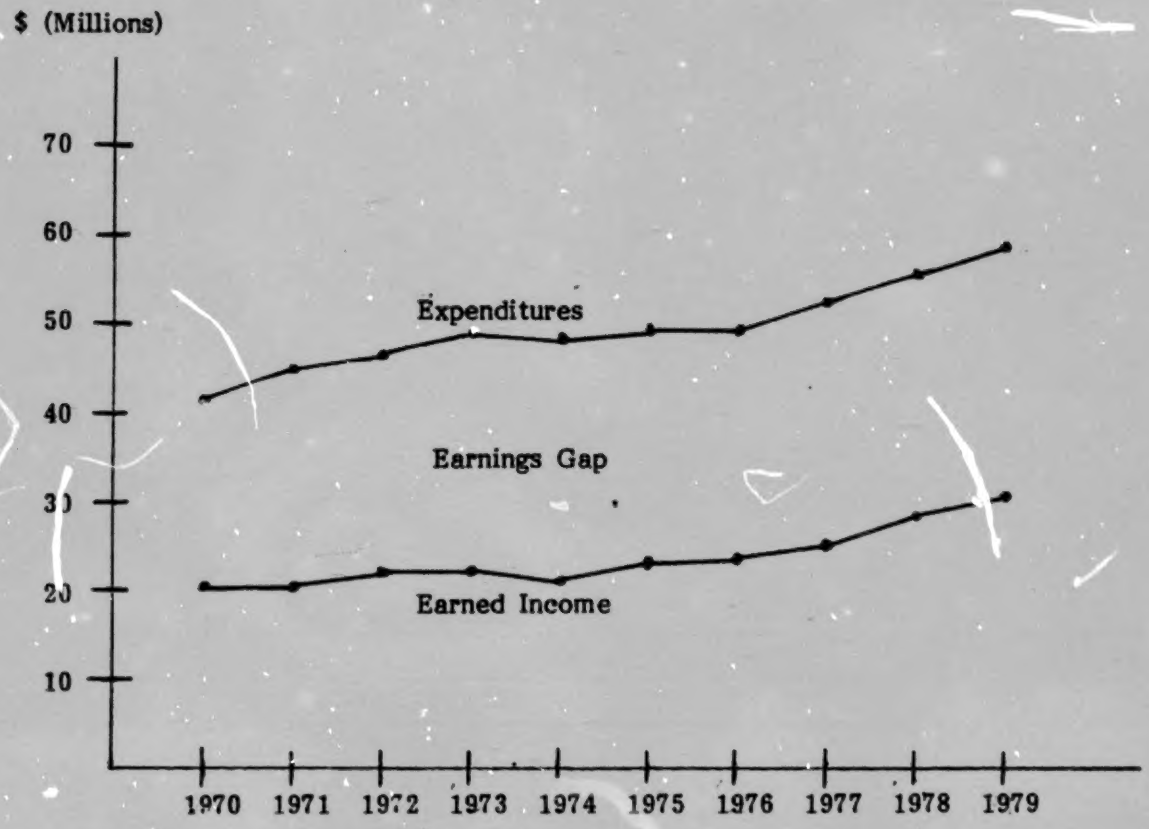
EARNINGS GAP
17 Major Orchestras
1970-1979



Source of data: American Symphony Orchestra League.
Data are in Tables 5-6 and 5-25.

FIGURE 5-3

EARNINGS GAP (IN CONSTANT 1970 DOLLARS)*
17 Major Symphony Orchestras
1970-1979



*Dollars deflated by Consumer Price Index.

Source of data: American Symphony Orchestra League.
Data are in Tables 5-6 and 5-25.

FIGURE 5-4

However, understanding why expenditures grew 2 1/2-fold requires a closer look at its components.

Figure 5-5 presents the components of expenditures and shows that over this decade the components grew on roughly parallel paths until the last two years, when there was a sharp drop in the proportion of artistic personnel costs, and hence, a rise in the percentages for the other costs. It should be noted that the sharp drop in artistic personnel costs in FY79 appears to be in part due to a better definition of terms and the addition of new lines in the ASOL questionnaire.[2] This resulted in the different placement of expenditures (now in more appropriate categories), and therefore, the data cannot be treated on an equal footing with previous years. For example, a detailed comparison of the 1978-79 reports of individual organizations with previous years' reports seemed to indicate that some of what was previously placed in artistic personnel costs now appeared in fees to orchestra, conductors, and guest artists for broadcasting and recording. This and other similar changes appear to indicate that the more precise questionnaire has led to a greater drop in the share of artistic personnel costs than would have been the case if the old form were continued. Nonetheless, not all the drop can be explained by a change in categories.

In a recent paper (Appendix E), Schwarz shows that differential economies can lead to a falling share for artistic personnel costs. Specifically, he mentions two types of economies: a result of economies of scale or of an organization reducing the number of performers for certain performances. An examination of the determinants of expenditures reveals an interesting picture.

Length of Season. In 1969-70, only 4 of the 17 orchestras had a full 52-week season, with the group as a whole having a weighted average length of season of 46.3 weeks, the weights being each orchestra's total gross expenditures. By 1978-79, the 13 largest had attained a full season. The total group had a weighted average of 51.1 weeks, an increase of slightly more than 10 percent.

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[2] In 1979, ASOL added the income and expenses of concerts for the pension fund. These additions result in slightly higher figures but are not large enough to change the overall picture.

PERCENT DISTRIBUTION OF TOTAL EXPENDITURES
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Artistic Personnel Costs	NA	60.0	58.5	59.4	60.7	59.9	60.4	59.6	57.8	53.8
Concert Production & Other Direct Costs	NA	27.5	30.5	29.0	27.0	28.0	27.2	28.1	29.6	32.3
General and Administrative	NA	10.4	9.6	9.7	10.6	10.2	10.5	10.3	10.6	11.2
Maintenance Fund Campaign (fund raising)	NA	1.8	1.7	1.8	1.7	1.8	1.9	2.0	2.1	2.3
Total (Expenditures)	NA	99.7	100.3	99.9	100.0	99.9	100.0	100.0	100.1	99.6
Reported Amount of Total Expenditures ($ Millions)	$42.1	47.3	50.8	55.6	59.3	67.4	72.7	81.9	92.6	108.2

Source of Data: American Symphony Orchestra League

See Tables 5-21 through 5-25.

(Percentages do not add to 100.0 because of rounding.)

FIGURE 5-5

Number of Regularly Employed Players and Their Average Weekly Salaries. Table 5-33 shows that the number of players regularly employed did not change over the decade and Table 5-34 shows that the average weekly player salaries grew almost exactly with the price level, with real wages remaining virtually constant.

Numbers of Performances. As shown in Table 5-29, the number of performances grew until FY77, after which they began to decrease.

What transpired over the decade? The real average weekly player salary and the number of regularly employed players remained virtually constant. On the other hand, the length of season increased slightly, increasing not only artistic personnel costs but also other costs as a result of the almost parallel growth in the number of performances. But in this respect, an important new trend should be pointed out. Over this decade the orchestras began shifting toward a larger proportion of performances by less than the full orchestra. This had the effect, noticeable at the end of the decade, of not only tempering the rise in costs but also changing the proportion of expenditures going to artistic personnel costs because a performance with less than a full orchestra requires the same or nearly the same amount of other costs.

Earned Income

Table 5-6 shows the total earned income[3/] of the 17 Majors, together with its growth rate. Figure 5-6 and Tables 5-2 through 5-5 show the components that constitute total earned income. The greatest growth in earned income was in broadcasting and recording and in the ubiquitous category of "other activities." However, the greatest dollar effect, of course, came from the largest component: income from performances at home and away. To understand why it grew at this pace, one needs to look at the determinants of performance income—ticket prices and attendance.

[3/] Although ASOL includes "government grants with services required" in their definition of earned income, we exclude it from earned income and include it in support income.

PERCENT DISTRIBUTION OF EARNED INCOME
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Performances at Home	NA	69.9	68.1	67.6	67.9	68.0	67.7	68.1	64.3	59.6
Performances on Tour	NA	15.9	17.8	17.0	16.0	16.3	15.7	14.9	13.2	13.4
Total Performance Income	NA	85.8	85.9	84.6	83.9	84.3	83.4	83.0	77.5	73.0
Broadcasting & Recording	4.5	6.3	6.4	5.3	4.8	4.1	5.9	7.6	8.2	9.4
Other Earned Income	NA	7.7	7.6	10.1	11.3	11.4	10.6	9.5	14.1	16.0
Total (Earned Income)	100.0%	99.8%	99.9%	100.0%	100.0%	99.8%	99.9%	100.1%	99.8%	98.4%
Reported Amount of Total Earned Income ($ Millions)	$20.1	21.9	24.2	25.3	26.2	31.9	35.0	39.5	47.6	55.9

Source of Data: American Symphony Orchestra League.

See Tables 5-2 through 5-6.

(Percentages do not add to 100.0 because of rounding.)

FIGURE 5-6

In order to get reliable attendance data,[4] use was made of data for the determinants of the largest subcomponent--ticket income for the regular home subscription series (RHSS), which is almost half of the income from all performances. Tables 5-1, 5-28, and 5-30, respectively, give the ticket income, number of performances, and attendance for the regular home subscription series. From these, an average ticket price (Table 5-32) was derived by dividing total ticket income (RHSS) by total season attendance (RHSS).[5]

It is clear that attendance grew along with the number of performances and that real ticket prices remained virtually constant. Hence, real ticket income grew, not as a result of real price increases but of the increase in attendance.

Unearned Income

The remaining element of the budget constraint is contributed (unearned or support) income. Table 5-19 shows the values of and growth rate for total support income as defined in this study, i.e., including grants/allocations for which services are required. (See footnote 1.) Real support income grew at slightly more than 3 percent--just about the growth rate of expenditures. (ASOL's supplemental income does not include grants and allocations with services required.) Although many grants require specific services (e.g., a concert in the park paid for by a grant from a local government source), these grants are not included in earned income for the reason that they are determined by some outside agency or foundation and are not subject to direct control by the orchestra as is ticket income by raising ticket prices. The data shown in Tables 5-17 and 5-18 combine to make our support income. The problem with ASOL's supplemental income is that it splits government, foundation, and corporate grants into two sub-parts ("with" and "without" services required) and aggregates the "with services required" (the larger part) under earned income. Since we wish to see a single figure for each of all private giving and all government giving (federal, state, and local), we recombined the data. Therefore, our support income is the sum of all private support, all government support, and endowment/investment income. (For other art forms, endowment/investment income is usually reported in the data with earned income and not in such a way that it could be recombined in support income. The current accounting treatment considers endowment earnings as earned not support income.)

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[4] Arts observers agree that data on the number of admissions for the arts are frequently highly unreliable. For the performing arts, the only generally reliable data are for those performances for which the performing organization sold tickets. In the orchestra discipline, the most reliable figures are for the regular home subscription series (RHSS).

[5] This method, used by Baumol and Bowen (Baumol, William J., and Bowen, William G. Performing Arts--The Economic Dilemma. Twentieth Century Fund, 1966.), actually yields the average ticket price bought rather than that offered. See Schwarz and Greenfield (Schwarz, Samuel, and Greenfield, Harry I. A Model for the Analysis of the Performing Arts: A Case Study of the Major Orchestras. Center for Policy Research, 1977. p. 35 and pp. 71-72) on the nature of this problem and why we can discount it for our data base.

An examination of the three components of support income, private and government support and endowment income (Tables 5-10, 5-15, and 5-16), reveals a non-uniform picture of growth. Although total support income grew at about 10 percent (the same rate as expenditures), government support grew faster (at almost 16 percent) and private support and endowment income grew slower (both at about 9 percent). This differential in rates of growth is not uncommon. Government support in most art forms increased at high rates during the 1970s in comparison with other forms of support. But it is important to also look at the amount of government support relative to the amounts of private support and earned income. Figure 5-7 shows the amounts and percentages of the components of total income at both the beginning and the end of the decade.

	1969-70		1978-79	
	$ Million	Percent	$ Million	Percent
Earned Income	20.13	50.1	55.89	51.6
Private Support	11.96	29.8	26.29	24.3
Endowment Income	5.26	13.1	12.47	11.5
Government Support	2.74	6.8	13.48	12.5
Total Income	$40.09	99.8	$108.15	99.9

The share of total income from government support has almost doubled over the decade, but it is still only half of private support and a third of private support and endowment income (long-term private support) added together.

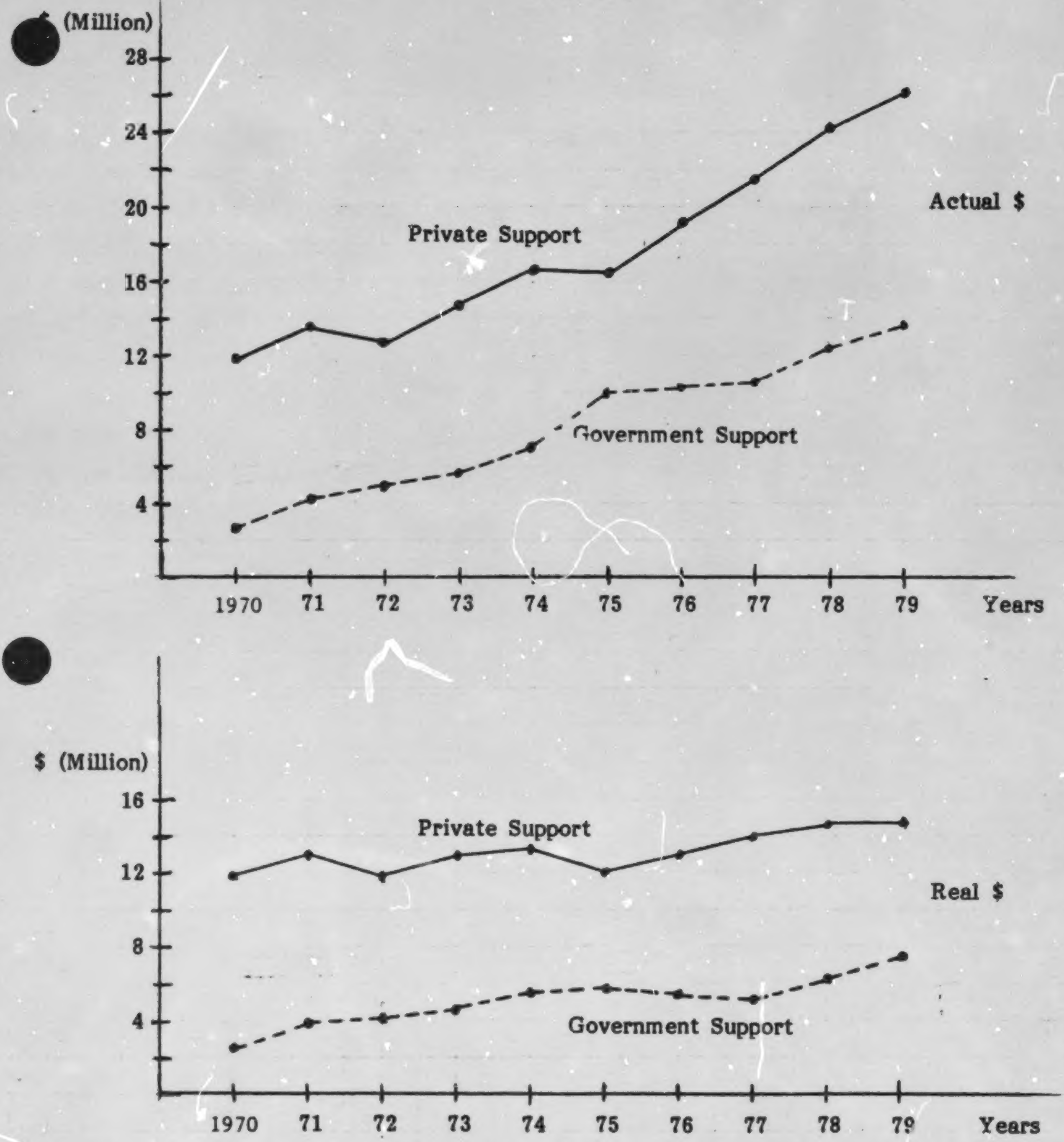
Figure 5-8 provides a picture of government and private support. The top graph shows both forms of support increasing throughout the decade. In real terms, however, the picture changes. Government support increased over the first half of the decade, leveled off, and grew again at the end of the decade (1978 and 1979). Private support, which in actual dollars (top of graph) grew sporadically during the first half of the decade and then showed steady growth in the second half, in real terms, showed no growth in the first half and all of its growth (2 percent over the decade) in the second half.

To understand the growth in government support, its components must be examined. Figure 5-9 (Tables 5-11 through 5-15) provides a picture of these components. It shows that, in real terms, growth was stagnant for all elements except grants from the National Endowment for the Arts. The large rise at the end of the decade came from the ASOL data item "NEA grants without services required," which is one of two ASOL data elements that reflect NEA funding to symphonies. This data item was very small for the first few years of the decade. Then after four years of no reported data (all NEA grants were in the "services required" category), large amounts ($1.1 and $3.5 million) were reported in 1978 and 1979. In a supplement to the guidelines for the annual ASOL comparative report form for 1977-78 as well as in the guidelines for the 1978-79 report, respondents were directed to record Challenge Grants under the line, "NEA grants for which no services were required." Thus, these large amounts represent receipt of NEA Challenge Grant funds.

According to the annual reports from the National Endowment for the Arts, 12 of the 17 orchestras received Challenge Grants in the period FY77 through FY79. These orchestras were matched against those listing funds received under "NEA grants with no services required" on the ASOL reports. There was a one-to-one correspondence of orchestras, except for two orchestras that did not list any funds on the ASOL reports. However, one of these noted the grant in a footnote, as well as the manner of disposition and the accounting method for statistical purposes.

Although the names of the recipient orchestras matched, the amounts for many orchestras were underreported on the ASOL lists. There are several reasons for the underreporting. Some of the grants were, at least in part, for the

PRIVATE AND GOVERNMENT SUPPORT
17 Major Symphony Orchestras
1970-1979

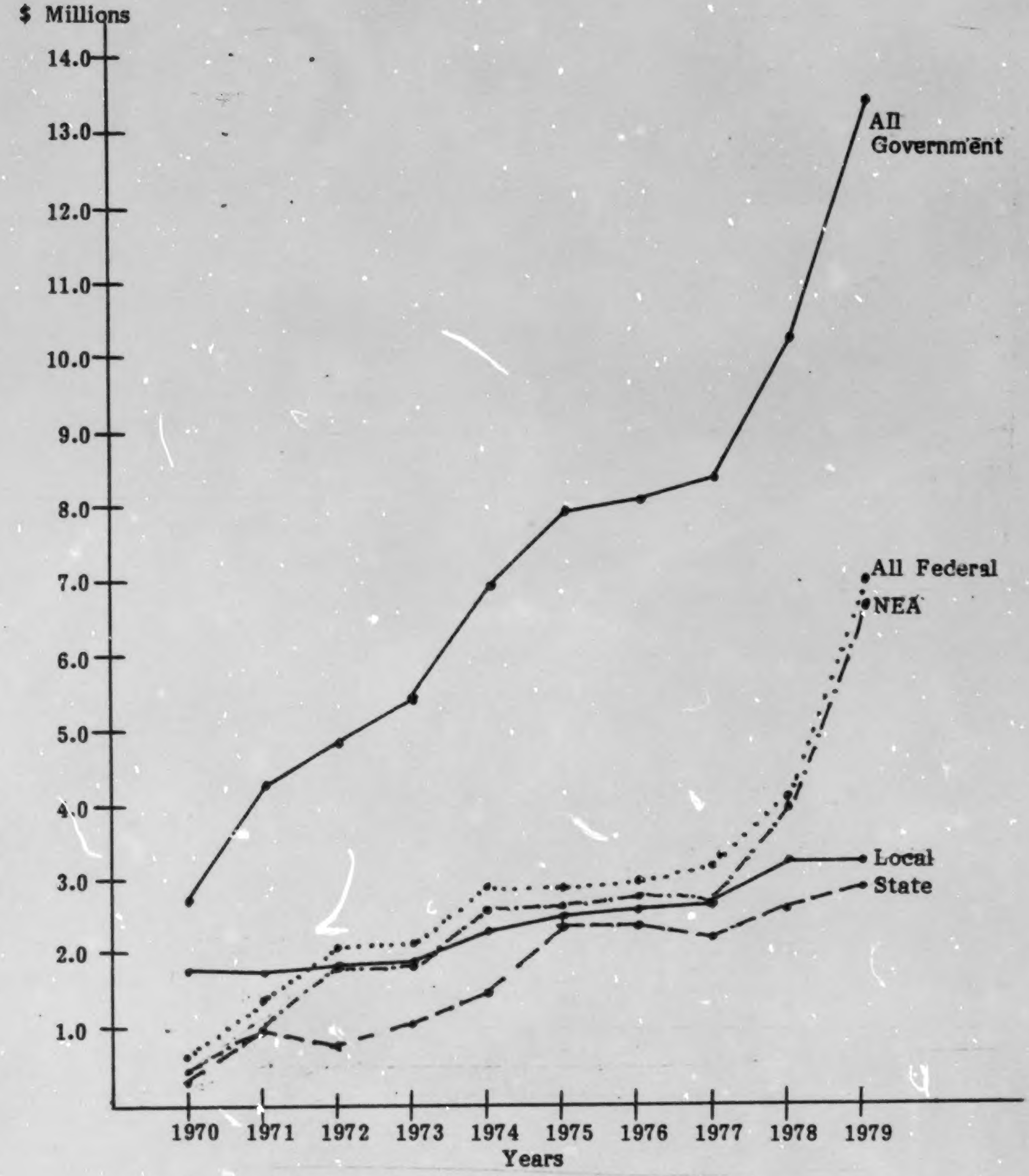


Data deflated using CPI readjusted to FY70 as the base.

Source of Data: American Symphony Orchestra League.
Data are in Tables 5-10 and 5-15.

FIGURE 5-8

COMPONENTS OF GOVERNMENT SUPPORT
17 Major Symphony Orchestras
1970-1979



Source of Data: American Symphony Orchestra League.
Data are in Tables 5-11 through 5-15.

FIGURE 5-9

elimination or reduction of accumulated deficits and/or augmenting an endowment fund. These monies, from an accounting standpoint, would have never entered the operating fund, which is what ASOL measures and reports. Therefore, an orchestra could have reported no income from Challenge Grants on the ASOL report.

A second reporting problem was the timing of the receipt of the Challenge Grant funds. These grants were for a three-year period. Some orchestras split the grants over three years; some met their "challenge," received the full amount within one year, and reported all the funds in one year. Unfortunately, the ASOL reports for FY80 and FY81 were unavailable for the study, making it impossible to determine whether orchestras reported remaining Challenge Grant funds in those years. A third reporting problem was found for the specific orchestras, as indicated above, that distributed Challenge Grant funds into various categories and cited these in a footnote.

Because no specific accounting treatment existed for multi-year grants and because reporting to ASOL was not consistent, some of the amounts went unreported. For example, one orchestra noted in a footnote to its 1977-78 ASOL report that although it had "raised sufficient matching funds required to release the full . . . grant it was awarded, . . . to reflect the multi-year nature of the Challenge Grant and to maintain comparability with the financial reporting methods of other orchestras, for the purposes of this report, the Challenge Grant award will be spread evenly across the three-year period (seasons 1977-78, 1978-79, and 1979-80)." Although one-third of the grant was reported in 1977-78, none was reported in 1978-79. Apparently, there was a change in accounting practice or else the arbitrary recognition of the grant was forgotten in subsequent years.

On the whole, it appears that almost all, if not all, of the funds listed under "NEA (no service required) Grants" did indeed come from the Challenge Grant program. This not only explains the quick growth of government grants at the end of the decade but also may shed light on the orchestras' behavior in this period, as will be demonstrated later. To understand this, a digression into the Challenge Grant program is necessary.

The NEA Challenge Grant Program

The Challenge Grant program was authorized by Congress in 1976, and its first funds were distributed in FY78. The broad goal of this program was to encourage long-term financial stability for arts institutions by securing new and increased sources of private contributions and by focusing attention on administrative techniques, especially long-range planning. It was hoped that it would spur arts organizations to "become more businesslike," according to then NEA Chairman Livingston Biddle.

In order to attain its goal, the NEA provided these grants for a multi-year period, usually three years, with the arts institution required to match each government dollar with at least three dollars of new or increased funds from private sources. Furthermore, short-term projects were not to be covered; funds were to address long-term, financially oriented problems. This is reflected in the NEA guidelines issued in October 1976, which gave the following examples under "Activities Qualifying for Support":

- To initiate or add to a cash reserve
- To establish or augment an endowment
- To help eliminate accumulated debts
- To meet increased operatng costs
- To assist special one-time projects (that would strengthen a grantee and assist fund raising)
- To provide capital improvements for cultural facilities.

From 1977 to 1980, the NEA awarded 281 Challenge Grants to 335 institutions for a total of $83,385,500. These organizations matched this with nearly $500 million in private contributions. The refocusing of NEA grants in the form of Challenge Grants with specific goals for improving the long-term financial stability of arts organizations had an impact on these institutions during the last years of the decade, as will be seen in this and subsequent chapters. But the NEA program was not alone in this effort; it was complimented by the Mellon Foundation program for major orchestras.

The Mellon Foundation Grants

In 1977, the Andrew W. Mellon Foundation embarked on a program "designed to compliment the Challenge Grant Program of the National Endowment for the Arts, and to convert into permanent financial strength the major part of the funds thus generated."[6] In 1977 and 1978, the Foundation appropriated $8.45 million of permanent endowment grants to the 31 Major Orchestras; $5.65 million of this amount was for the 17 Majors. These awards generally carried a 3-1 matching requirement. Their purpose was "to assist each orchestra to improve its net current position during a five-year period and then sustain a balanced budget for at least three years." After this period, the income on both the grant and the matching funds "will be available for general artistic purposes."

While similar in purpose to the Challenge Grant Program, the Mellon grants, however, were exclusively endowment grants. Hence, they do not appear anywhere on the ASOL reports. But their effect on budget balancing does appear, as will be discussed below.

Bringing the Components Together

When there is a similar rate of growth of both expenditures and earned income, the earnings gap also grows at that same rate. (See page 4-6 for such an example.) Figure 5-10 shows that, for the 17 Major orchestras over the 1970s, earned income grew at a somewhat quicker pace than did expenditures; hence, the growth in the earnings gap was somewhat slower than that in expenditures. Furthermore, total support income grew at about the same rate as expenditures and greater than the earnings gap, decreasing the size of the annual operating deficit (Figure 5-12).

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[6] Report of the Andrew W. Mellon Foundation, 1977, p. 10.

GROWTH OF MAJOR COMPONENTS
17 MAJOR ORCHESTRAS

Component	Actual Growth Rate	Real* Growth Rate	Table Reference
Earned Income	11.69%	4.36%	5-6
Support Income	10.31%	3.06%	5-19
Total Income	10.88%	3.71%	5-20
Total Expenditures	10.5%	3.30%	5-25
Earnings Gap	9.45%	2.26%	5-27

*Deflated using the CPI.

FIGURE 5-10

An important recent development should be noted. Over most of the decade, growth proceeded steadily—with a seemingly balanced and constant pattern. In the last two years, however, the orchestras seemed to have slammed on the brakes. The number of performances by the full orchestra were sharply decreased, and hence, the total number of performances also declined. As a result, the share of expenditures going to artistic personnel costs decreased, tempering the growth of expenditures and the earnings gap.

The last two years also saw the institution of the NEA Challenge Grant program and that of the Mellon Foundation. They were at least partly responsible for the cut in output noted above. These programs had two other effects as well. Because the Mellon Grants and many of the Challenge Grants were for augmenting endowments and due to the program's matching funds requirement, the endowments for many orchestras were increased, as is obvious from the sharp rise in the real income from endowments and investments at the end of the decade (Table 5-16). At the same time, they appear to have influenced the sharp decrease in the annual operating deficits during the final two years of the decade.7/ Indeed, the expressed purpose of many of the grants was the elimination of an accumulated deficit.

7/ It should be noted, however, that it is not clear whether the decrease in operating deficits represents a bona fide drop by the total amount or, perhaps, part of it is simply an "artificial" transfer of funds. Because ASOL instructions called for the placement of NEA Challenge Grants on a given line of its report, it is quite possible that an orchestra could place the entire amount of the grant on its income report, even though part of it was to go into the endowment fund. The difference could be made up on the balance sheet by transfering funds from an operating fund surplus to its endowment fund. In fact, one of the Major orchestras (but not one of the 17) footnoted such a transfer.

This returns to the basic theme of Chapter 4. On paper, the 17 orchestras seemed better off at the end of the decade because of smaller deficits. But at what expense? Without even addressing the question of quality (i.e., are performances by the full orchestra of the same quality as those by half of an orchestra?), the absolute number of performances was down. Clearly, output by any measure was the victim.

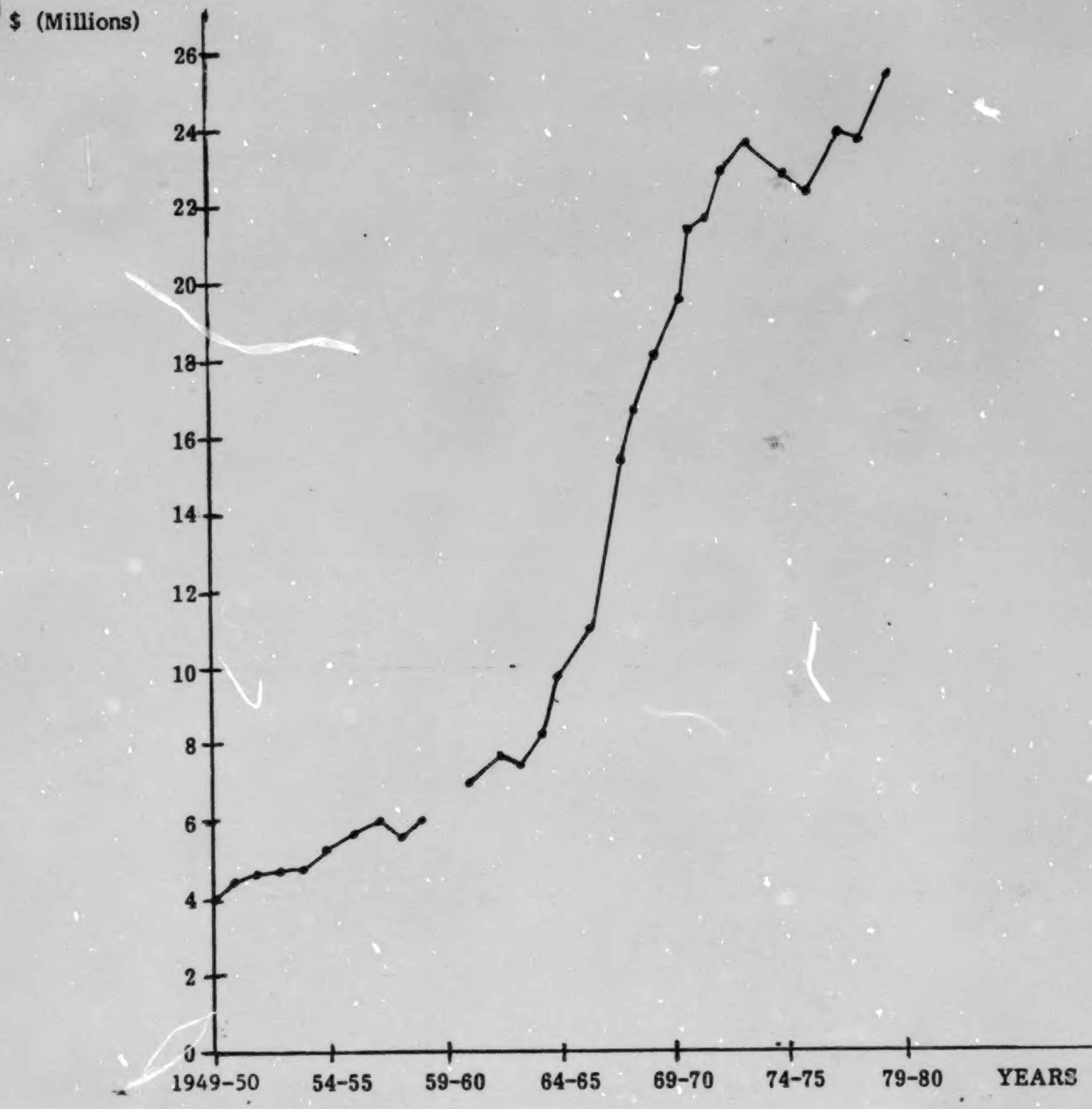
The Seventies in an Historic Perspective

Thus far, this study has dealt with the growth of the 17 orchestras in the decade of the 70s. But were those years normal or abnormal? Were the growth rates over that decade large or small? If so, relative to what measure? The only way to obtain a relevant yardstick is to examine a longer time period with different rates of growth. This will also yield a better understanding of the direction of change and give a better outlook on the future.

Figures 5-11 and 5-12 show, respectively, the total earnings gap and deficit for the 17 Major orchestras over the period 1949-50 through 1978-79 (except for the 1959-60 season, for which there is no known data). The figures have been deflated by the Consumer Price Index (1967=1.0). These two graphs portray the end results of the economic behavior of the 17 Major orchestras. To explain these results and to understand the patterns of finances of the orchestras in general, various income and expense items must be examined.

Total expenditures are determined by the amount of output and the prices of the factors used in producing that output. Because the performing arts are very labor intensive, labor has a direct role in determining total expenditures through its key role in the determination of both the number of pay periods (which, in turn, determines output) and the wage rate per period. Thus, to determine total expenditures, these two dimensions of artistic wages must be examined. While the prices of other factors of production are primarily exogenously determined (save for the wages of non-artistic personnel), artistic wages are endogenously determined, viz., they are affected by financial conditions in the orchestras. In order to analyze the determination of wages, one must also look at the other side of the coin--the income to the orchestras. But first, a digression into the determination of artistic wages is necessary.

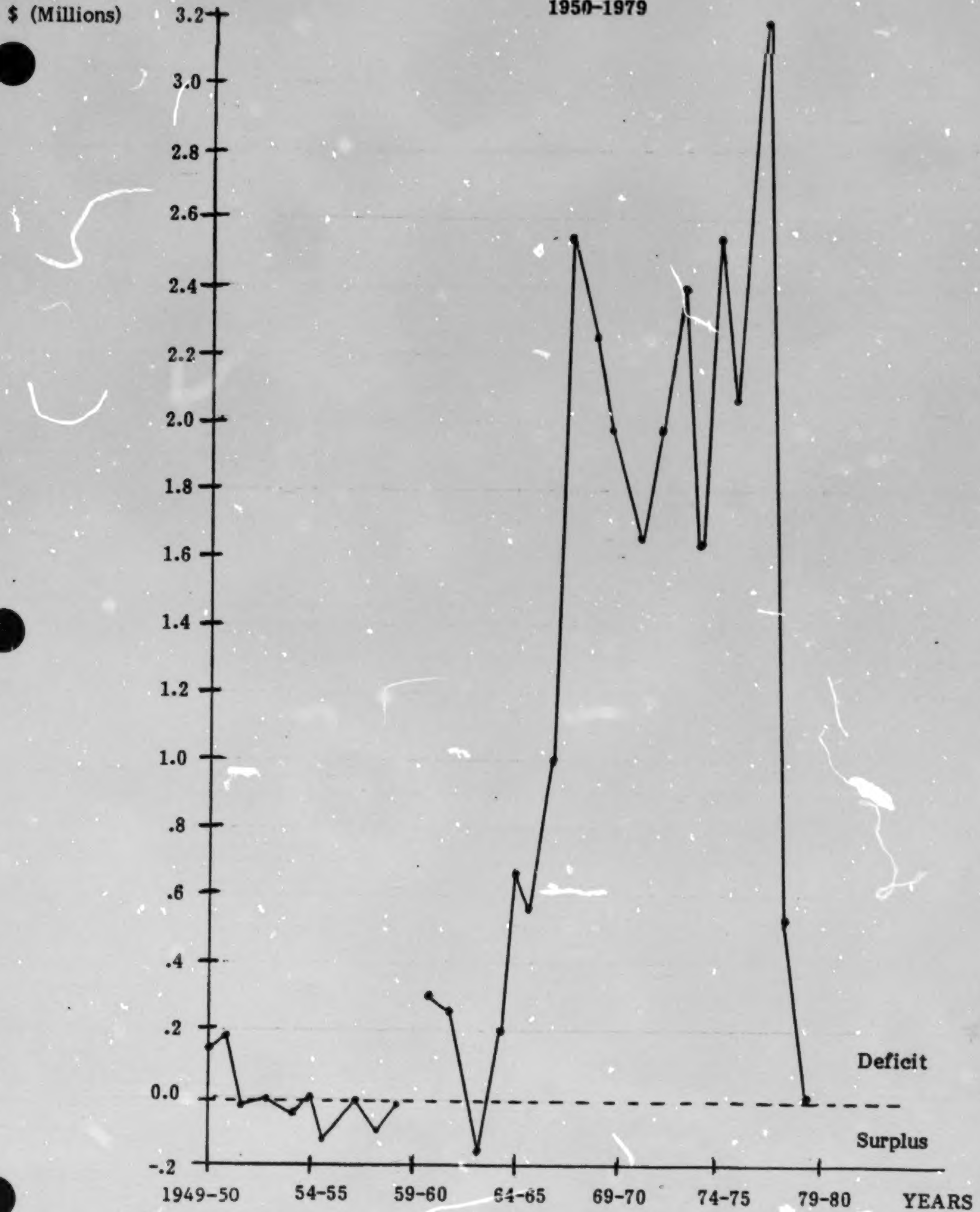
TOTAL EARNINGS GAP (1967 DOLLARS)
17 MAJOR ORCHESTRAS
1950–1979



Source of Data: American Symphony Orchestra League.
Data are in Table 5-27.

FIGURE 5-11

TOTAL DEFICIT (1967 DOLLARS)
17 MAJOR ORCHESTRAS
1950–1979



Source of Data: American Symphony Orchestra League.
Data are in Table 5-26.

FIGURE 5-12

There is a long-standing question of whether labor presses its demands even in the absence of an expected increase in income. This was raised especially with regard to the tremendous wage increases of the 1960s during which (in mid-1966) the Ford Foundation began its huge symphony support program.[8/] Because the two events occurred almost simultaneously, it can be argued that the Ford Foundation grants set off the huge increases in wages. On the other hand, some argue that although the grants further stimulated player demands, these rising demands existed even in the absence of the Ford Foundation grants. We could note the increases before 1966 to support this point. To obtain a fuller understanding, the exact timing of the events and what happened before and after the immediate period must be examined.

Although the Ford Symphony Program was not announced until July 1966, there was a long planning stage--at least three years, according to one reliable source of information--during which period it became known to the orchestras and players that such a program was being planned. Hence, the salary increases in the preceding two years were agreed to because of the expectation of future symphony funding. In addition, the early 1960s were, generally, a period of high expectations brought on by the Kennedy administration and a belief in a "cultural boom." This resulted in the formation of the National Endowment for the Arts and the beginning of federal funding for orchestras.

Because of the budget constraint, no matter how strong player demands are, they will not be met unless there is an equal increase in the supply of funds, i.e., unless the orchestra can afford to pay for it. This is true for any labor negotiation. Even the most powerful unions cut back their demands when the organizations are on the verge of bankruptcy. So long as unions are aware of a supply--or an expected supply--of funds, they will press their demands. The expected supply need not be a definite source of funds, simply the expectation that somehow the demands will be

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[8/] The Foundation committed over $39 million to the 17 Major orchestras: about $30 million, to be held as endowment trusts until 1976 and to be released to an orchestra if it raised an agreed-upon sum by 1971, which would also be held in an endowment trust until 1976, and about $9 million in expendable grants and development grants over the period 1966-71.

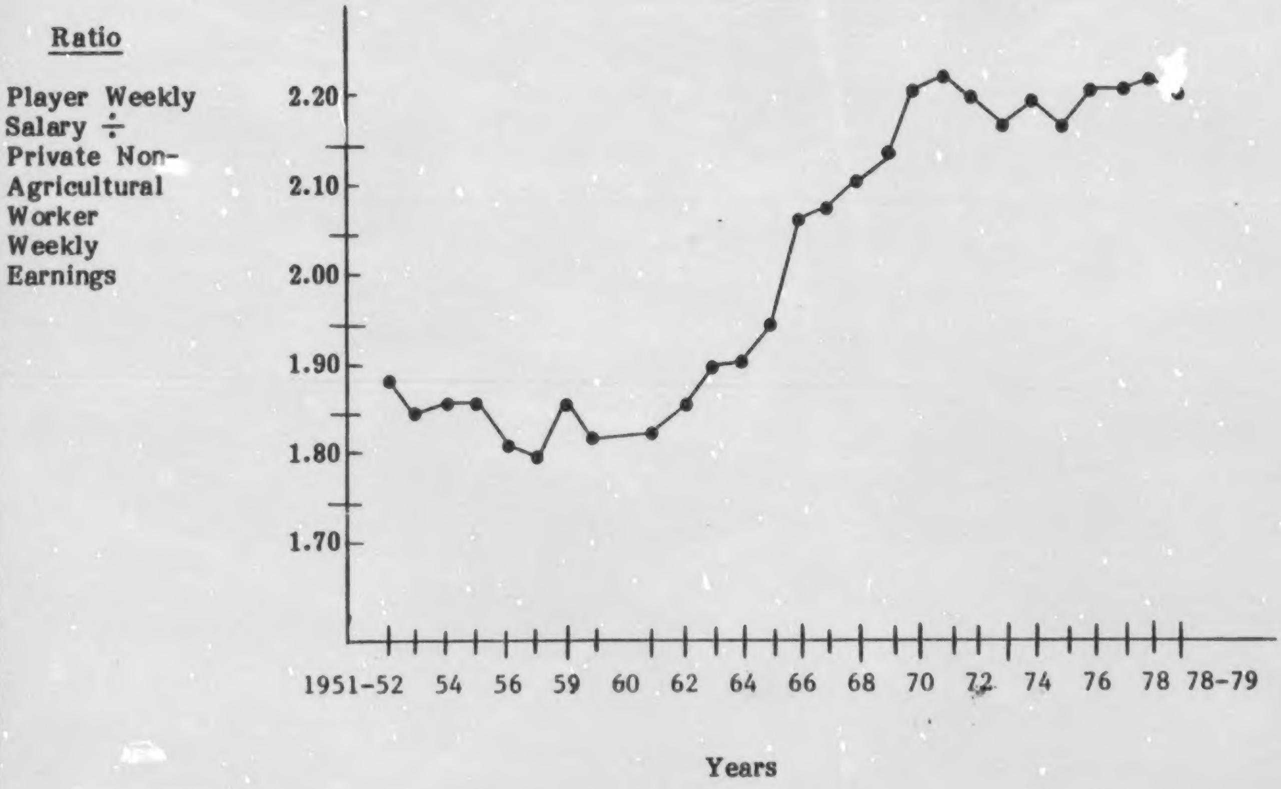
met. However, once the supply of funds dries up, unions will necessarily taper their demands rather than force the organizations to close down. This is precisely what has happened in recent years in the auto industry and with numerous municipal unions, for example.

This is also what happened with the orchestras. After the Ford Foundation program started, labor successfully pressed its demands, thus improving the position of orchestra players relative to wages in the rest of the economy (as measured by the ratio of average weekly salary of players to that of average weekly earnings in the private, nonagricultural sector). Figure 5-13 shows the ratio of the average weekly salary of players for selected years from 1951-52. During the first decade, the relative position of players decreased, but by less than 5 percent. The 1961-62 season marked the beginning of a period of steady rate of growth. The rate accelerated beginning with the 1965-66 season, and the relative position finally reached its peak in 1970-71. Then came two seasons of decline and a relatively steady level during the seventies.

The latter half of the 1960s marked a change in the growth in wages in the general economy in that the real average weekly salary of the general worker grew slowly. This contrasted with the long period of steady growth of the fifties and early sixties. At the same time, the real salary of players was increasing, raising their relative position. During the seventies, real salaries of both players and workers in the general economy did not grow at all, thus maintaining a stable ratio. Therefore, over the 30-year period the endogenously determined artistic wages rose.

To reiterate, increases in expenditures can be maintained only with a corresponding increase in income. The next question to be answered is, how was income increased? Given the nature of demand for regular series tickets, ticket revenue can be increased by increasing ticket prices, but because ticket income is only a part--and apparently an increasingly smaller part--of total income, and because arts organizations hesitate to raise prices so as not to decrease admissions or to price tickets out of the range of the general public, increases in ticket income alone can only support a small increase in expenditures. Thus, contributions play an important role. Specifically, can the orchestras influence the amount of contributions, thus using them as an instrument in balancing the budget, or are contributions determined elsewhere and treated by the orchestras as a given variable that is outside their influence?

ORCHESTRA PLAYERS/GENERAL ECONOMY WEEKLY SALARY RATIO



See Figure 5-13-A for data.

FIGURE 5-13

DATA FOR PLAYER/GENERAL ECONOMY WEEKLY WAGE RATIO

	Average Player Weekly Salary* ($)	Average Gross Weekly Earnings of Total Private Nonagricultural Workers** ($)	Ratio: Players to Private Nonagriculture Workers
FY 1952	112	59.5	1.88
1953	116	62.5	1.85
1954	120	64.5	1.86
1955	124	66.5	1.86
1956	126	69.5	1.81
1957	129	72	1.79
1958	138	74	1.86
1959	140	77	1.82
1960	No Data	80	—
1961	150	82	1.83
1962	157	84.5	1.86
1963	165	87	1.90
1964	171	89.5	1.91
1965	181	93	1.95
1966	199	97	2.05
1967	208	100.5	2.07
1968	224	106	2.11
1969	239	111.5	2.14
1970	259	117.5	2.20
1971	275	123.5	2.22
1972	289	132	2.19
1973	306	141	2.17
1974	328	150	2.19
1975	346	159.5	2.17
1976	373	169.5	2.20
1977	400	182	2.20
1978	435	196.5	2.21
1979	465	212	2.19

*Data derived in Schwarz and Greenfield (1977, p. 11) and updated using data in Table 5-34. Includes only those regularly employed players on weekly salary.

**Economic Report of the President, 1980, Table B-36. Figures adjusted to match fiscal year end (June 30) common to most orchestras.

FIGURE 5-13A

Prior to 1960, the orchestras as a group did not attempt to increase the level of orchestra contributions relative to total philanthropy.[9] Rather, they treated contributions more or less as a deus ex machina: whatever came, they took. However, especially after 1966, the situation changed, due to the Ford Program, the institution of government funding--especially the NEA-- and the general increase in fundraising abilities. How then did the orchestras balance their budgets during the 30-year period?

For the first decade (1950s), the finances of the major orchestras followed a very passive path. (1) Output was relatively constant, while the players' real weekly salary went up only slightly--the relative position of orchestra players declined, yielding a slow growth of expenditures. (2) Ticket price increases kept up roughly with those of the price level, but the last half of the decade showed an increase in admissions, and therefore, because of the inelasticity of demand for regular subscription series tickets with respect to their real price, ticket income increased more than the price level. (3) Real contributions increased somewhat, mainly because of increased income from endowments and grants, as those from the Regular Maintenance Fund (the yearly fund raising) campaign remained about constant. The goal was a zero-deficit budget, and indeed, this was more or less attained. Note the modest growth of the earnings gap in Figure 5-11 and the fluctuations of surpluses and deficits around the zero level in Figure 5-12. The behavior during the period closely resembled that of a natural growth of the earnings gap at a constant level of output.

Then came the 1960s. Grant income increased, union power increased, and expectations rose. Wage rates and length of season began increasing. But it was not until even greater expectations were realized--the Ford program--that wages showed significant growth. The program affected the orchestras in several ways. During this decade, (1) the average length of season increased by more than 50 percent, (2) the relative weekly wage rate increased to a new high level, (3) fund-raising efforts were expanded so that not only endowment income increased (as a result of the growing endowment corpus), but also the regular maintenance fund contributions increased greatly, relative to general philanthropy. This was triggered by the Ford Foundation requiring matching endowment funds during the first five years of their program. It was not until 1969-70 that relative contributions increased, since for the first three years much of the increased contributions went to endowment rather than for operating expenditures. Even after the period of matching fund ended, the machinery was in place, with new sources of contributions open, and (4) a new level of total deficit occurred: about $2 million in the aggregate for the 17 Major orchestras (Figure 5-12). Rather than striving for a zero-deficit level with an increased endowment corpus, the 17 orchestras now sought to balance their budgets over the very long run.

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[9] See Schwarz and Greenfield (op. cit. pp. 88-90) for a discussion on symphony contributions relative to general philanthropy.

The orchestras had now reached a new level of operation, and as a result, had much larger earnings gaps and annual deficits. Because the ASOL data do not contain any information on how the orchestras funded their deficits, we turned to data gathered by the Ford Foundation for the years 1965-66 through 1973-74. The Ford Foundation provided data on "corpus principal transferred to operations" for 16 of the 17 orchestras. Figure 5-14 shows this transferred corpus principal in the second column. The first column shows the total deficit for the same 16 orchestras as reported on the ASOL reports. It would appear from the totals that these orchestras transferred more corpus principal over the period than was necessary to cover their deficits, a somewhat puzzling action.

However, when the deficit prior to the corpus transfers as reported in the Ford Foundation survey was compared with the ASOL deficit for each of the 16 orchestras, a different picture emerges (the third column of Figure 5-14 gives total deficits). This comparison showed that some of the orchestras, for at least some of the years, included corpus transfers to the operating fund as income on the ASOL report, thereby reducing or eliminating deficits. (Until the late seventies, the ASOL survey gathered data only on the operating fund, a transfer could be shown only as an income item; there were no data items for transfers.) It is apparent from the Ford Foundation data that the major orchestras dipped heavily into their endowment corpus to meet this $2 million deficit.

Furthermore, ticket prices increased at a quicker rate than they did during the fifties, following a steady trend line, but because of inflation, after first increasing, real prices leveled off. As a result of this and of a steady increase in admissions, real

REPORTED DEFICITS
16 Orchestras
1966-1974

	Deficit As Reported By ASOL	Corpus Principal Transferred As Reported By The Ford Foundation	Deficit As Reported By The Ford Foundation
1965-66	$ 365,024	$ 541,421	$ 741,100
1966-67	171,779	1,222,836	557,749
1967-68	1,787,550	1,675,186	2,111,652
1968-69	1,594,619	1,890,033	1,663,074
1969-70	1,365,261	1,851,083	2,493,154
1970-71	1,511,746	1,930,575	2,505,317
1971-72	1,663,747	2,191,111	2,872,237
1972-73	2,339,268	2,228,936	3,112,855
1973-74	2,270,194	1,053,063	3,124,965
TOTAL	$13,069,188	$14,584,244	$19,182,103

FIGURE 5-14

ticket income first increased and then leveled off at the end of the sixties. Because of the relatively small increase in real ticket income and the unprecedented rise in the orchestras' level of operation, player wage rates, and expenditures, the now immensely increased earnings gap was funded by an equally unprecedented rise in contributions from grants and endowments and also from regular contributions and special projects. The behavior of the sixties produced an increased earnings gap not only as a result of its natural growth, but also as a result of an immensely greater level of output and wage-rate increases over and above those in the general economy.

After the dynamic growth of sixties, the seventies was a period of settling down. With 13 of the orchestras at or close to a season of 52 weeks, the average length of season increased only slightly. Although the number of performances increased during most of the decade, especially ensemble performances, they decreased during the last two years, particularly those by the full orchestra. At the same time, real player wage rates remained constant over the decade, and hence real expenditures grew at a slower pace. Total real contributed income grew at a much slower rate than during the sixties, and real ticket income increased only slightly.

It appears that the huge wage increases could no longer go on, and a period of relatively natural growth in the earnings gap again ensued. Now, however, it was of a different and greater gap at a much higher level of output than that of the fifties and required growth in contributions. Part of the needed increase in contributions came from a continued steady depletion of endowment capital, a policy that seemed firmly implanted. However, as is obvious from Figure 5-12, during the last two years of the seventies, the orchestras immensely reduced their deficit level.

These later years also marked the beginning of the NEA Challenge Grants program, as well as the Mellon Foundation program. These programs not only increased endowment funds, but seem also to have had some influence on the recent cut in performances as well as on the sharp decrease in the level of operating deficits. The latter pattern was continued in 1979-80, but what remains to be seen are the long-term effects of the program, i.e., will a zero-level deficit last into the future or only for the duration of the grant period. After all, long-term influence was the raison d'etre of both programs.

THE OTHER SAMPLES: MAJOR, REGIONAL, AND METROPOLITAN ORCHESTRAS

The Five Key Variables

The 17 Major orchestras were seen in the last section to have exhibited slow growth in the 1970s. But what about the rest of the orchestra universe?

Figure 5-15 presents the growth rates of five key variables—earned income, support income, total income, expenditures, and earnings gap--for each of the groups of orchestra samples described at the beginning of this chapter. The figure indicates that all the groups followed the basic pattern of the 17 Majors, with some deviations that deserve explanation.

(1) One of the major conclusions of the framework for analysis exposited in Chapter 4 was that within the same class of organizations, older, more established arts organizations in general have smaller growth rates than newer, less established ones. This would appear to explain the larger growth of the rest of the Major orchestras (the entire group of 31) than the 17 and also the even larger growth of the Regionals.

(2) The somewhat larger growth of the 15 Regionals than of the entire group of Regionals is primarily due to one very aspiring orchestra that grew about sevenfold over the decade and entered the ranks of the Majors in 1979-80.

(3) The relatively small growth of the Metropolitans as well as its variance with the subset of 12 Metropolitans requires a better understanding of the nature of derivation of the totals for all of the Metropolitans.

The derivation of the totals for the Metropolitans were obtained for each year by blowing up the figures from those Metropolitans that did report for that particular year. Figure 5-1 shows that the number of organizations reporting not only varied from year to year, but also more than doubled over the decade. A deeper probe into the data reveals an interesting phenomenon that will clarify the puzzle.

GROWTH RATES OF SEVEN [illegible]OUPS OF ORCHESTRAS

Economic Variables	Groups of Orchestras (As described in Figure 5-2) 17 Majors	31 Majors	15 Regionals	12 Metropolitans	29 Regionals	83 Metropolitans	All 143
EARNED INCOME	11.7 (.35)[1]	11.8 (.31)	16.0 (.22)	12.1 (.27)	14.6 (.28)	8.5 (.35)	11.7 (.28)
	4.6 (.29)[2]	4.6 (.24)	8.6 (.21)	5.0 (.26)	7.3 (.28)	1.6 (.30)	4.5 (.21)
	4.4 (.27)[3]	4.4 (.22)	8.4 (.22)	4.8 (.27)	7.1 (.27)	1.4 (.30)	4.3 (.19)
Tables:	5-6	5-39	5-64	5-76	5-82	5-88	5-94
SUPPORT INCOME	10.3 (.19)	10.8 (.22)	12.1 (.20)	11.2 (.22)	11.8 (.34)	7.6 (.21)	10.5 (.20)
	3.3 (.22)	3.7 (.24)	5.0 (.18)	4.1 (.23)	4.7 (.32)	.7 (.24)	3.4 (.21)
	3.1 (.23)	3.5 (.25)	4.8 (.19)	3.9 (.24)	4.5 (.31)	.5 (.27)	3.2 (.23)
Tables:	5-19	5-50	5-68	5-77	5-83	5-89	5-95
TOTAL INCOME	11.0 (.21)	11.3 (.19)	13.7 (.19)	11.5 (.18)	12.9 (.29)	8.0 (.20)	11.0 (.17)
	3.9 (.19)	4.2 (.16)	6.5 (.19)	4.4 (.19)	5.7 (.28)	1.1 (.19)	3.9 (.14)
	3.7 (.18)	4.0 (.16)	6.2 (.19)	4.2 (.21)	5.5 (.27)	.9 (.21)	3.7 (.14)
Tables:	5-20	5-51	5-69	5-78	5-84	5-90	5-96
EXPENDITURES	10.5 (.17)	10.8 (.17)	14.3 (.23)	11.2 (.18)	13.5 (.35)	7.6 (.20)	10.9 (.15)
	3.5 (.15)	3.8 (.13)	7.0 (.19)	4.1 (.11)	6.3 (.32)	.7 (.15)	3.8 (.12)
	3.3 (.15)	3.6 (.13)	6.8 (.18)	3.9 (.12)	6.0 (.30)	.5 (.17)	3.6 (.11)
Tables:	5-25	5-56	5-71	5-79	5-85	5-91	5-97
EARNINGS GAP	9.4 (.14)	10.5 (.14)	13.2 (.29)	10.7 (.28)	12.8 (.43)	6.9 (.23)	10.3 (.14)
	2.5 (.18)	3.4 (.17)	6.0 (.24)	3.6 (.21)	5.6 (.38)	.9 (.20)	3.3 (.15)
	2.3 (.20)	3.2 (.19)	5.8 (.22)	3.4 (.21)	5.4 (.37)	-.1 (.22)	3.1 (.16)
Tables:	5-27	5-58	5-73	5-81	5-87	5-93	5-99

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[1] Growth rate of actual dollars and corresponding standard deviation in parentheses.

[2] Growth rate as deflated by the Implicit GNP Deflator with standard deviation.

[3] Growth rate as deflated by the Consumer Price Index with standard deviation.

FIGURE 5-15

Figure 5-16 presents the fraction (percentage) of organizations reporting that have total expenditures less than the average for all organizations reporting that particular year. The numerals along the diagonal are for the total number of organizations reporting that year. The off-diagonal numerals along each row (horizontal) are for the organizations reporting in each year listed on the top that have also reported in the year listed on the left for that given row. For example, proceeding along the second row (FY71), the first numeral (21/36) indicates that 36 organizations reported that year and 21 (or 58 percent) of them had expenditures less than the average; the second figure (16/34) indicates that in FY72 only 34 of the original 36 reported, and 16 (or 47 percent) of the 34 had expenditures less than the average figure for all 39 organizations reporting in FY72, as is indicated by the bottom figure in that column; and the third figure (9/25) indicates that in FY73, only 25 of the original 36 reported, while 9 (or 36 percent) of the 25 had expenditures less than the average for all 32 reporting in FY73.

A look at Figure 5-16 reveals that the orchestras reporting in the early years of the decade were larger-expenditure orchestras on the average than those reporting in the late years of the decade. This pattern is most clearly seen in the columns for FY78 and FY79. Of all the organizations reporting in each of these two years, 60 in FY78 and 63 in FY79, 50 and 54 percent, respectively, had expenditures less than the average. Of those that had already reported in FY75 or before, only 27 percent (10/37) and 34 percent (13/38), respectively, had expenditures less than the average amount for all the organizations reporting in FY78 or FY79, respectively.

In fact, this pattern could be anticipated, for it has been shown in Chapter 3 that many orchestras entered the ranks of the Metropolitans toward the end of the decade because of inflation creep; i.e., inflation drove their budgets above the $100,000 minimum requirement. If so, it was only natural that the average total real expenditures were constantly being lowered.

Because the orchestras reporting at the beginning of the decade were higher-budget orchestras than those reporting at the end, the growth rates that have been established are underestimates of the growth that would have been obtained if

PERCENTAGE OF REPORTING METROPOLITAN ORCHESTRAS WITH TOTAL EXPENDITURES BELOW AVERAGE

Numbers (Percentage) of Organizations That Began Reporting In:	Reporting Years									
	FY70	**FY71**	**FY72**	**FY73**	**FY74**	**FY75**	**FY76**	**FY77**	**FY78**	**FY79**
FY70	$\frac{15}{26}$ (58%)	$\frac{13}{26}$ (50%)	$\frac{9}{24}$ (38%)	$\frac{5}{19}$ (26%)	$\frac{8}{20}$ (40%)	$\frac{11}{25}$ $16%)	$\frac{9}{23}$ (39%)	$\frac{11}{26}$ (42%)	$\frac{5}{22}$ (23%)	$\frac{7}{23}$ (30%)
FY71		$\frac{21}{36}$ (58%)	$\frac{16}{34}$ (47%)	$\frac{9}{25}$ (36%)	$\frac{13}{27}$ (48%)	$\frac{17}{33}$ (52%)	$\frac{14}{30}$ (47%)	$\frac{16}{34}$ (47%)	$\frac{8}{29}$ (28%)	$\frac{10}{31}$ (32%)
FY72			$\frac{21}{39}$ (54%)	$\frac{12}{29}$ (41%)	$\frac{16}{32}$ (50%)	$\frac{19}{36}$ (53%)	$\frac{14}{33}$ (42%)	$\frac{17}{37}$ (46%)	$\frac{8}{31}$ (26%)	$\frac{10}{32}$ (31%)
FY73				$\frac{15}{32}$ (47%)	$\frac{14}{29}$ (48%)	$\frac{14}{31}$ (45%)	$\frac{11}{28}$ (39%)	$\frac{12}{30}$ (40%)	$\frac{6}{28}$ (21%)	$\frac{6}{27}$ (22%)
FY74					$\frac{27}{43}$ (63%)	$\frac{24}{39}$ (61%)	$\frac{18}{36}$ (50%)	$\frac{21}{40}$ (53%)	$\frac{8}{33}$ (24%)	$\frac{10}{34}$ (29%)
FY75						$\frac{31}{50}$ (62%)	$\frac{21}{41}$ (51%)	$\frac{24}{45}$ (53%)	$\frac{10}{37}$ (27%)	$\frac{13}{38}$ (34%)
FY76							$\frac{26}{48}$ (54%)	$\frac{24}{47}$ (51%)	$\frac{12}{39}$ (31%)	$\frac{10}{36}$ (28%)
FY77								$\frac{33}{59}$ (56%)	$\frac{20}{50}$ (40%)	$\frac{20}{48}$ (42%)
FY78									$\frac{30}{60}$ (50%)	$\frac{25}{50}$ (50%)
FY79										$\frac{34}{63}$ (54%)

Source of Data: American Symphony Orchestra League.

FIGURE 5-16

all 83 orchestras had reported for each year of the decade. The total expenditures for the early years was blown up from an average for higher-budget orchestras; the total figure for the later years was blown up from an average for lower-budget orchestras.

If the data are taken at face value--and that is what the calculated growth rates have done, they would indicate that total expenditures did not grow much over the decade. However, if the figures for all the years, for either the group of orchestras that reported at the start of the decade or the group that reported at the end, were obtainable, they would indicate a larger growth for each of the two groups. In fact, the subsample of 12 Metropolitans is a group that is continuous over the decade. Figure 5-17 compares the 12 in the same format as Figure 5-16, showing the fraction (percentage) of the 12 that had expenditures less than the average of all Metropolitans reporting in each year. It shows that, although during the first two years, this fraction was identical to that of all Metropolitans reporting in those years (see Figure 5-16), it decreased over the decade, apparently as more and more smaller-budget orchestras reported data. The same fractions indicate that the 12 are a representative sample of all the Metropolitans reporting in the first two years, at least in terms of expenditure levels. The latter, in turn, represents 43 percent of all the 83 Metropolitans.

FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
7/12	7/12	5/12	5/12	5/12	5/12	4/12	3/12	1/12	2/12

FIGURE 5-17

In conclusion, all the data presented seem to indicate that the actual growth rates of five key variables for all of the 83 Metropolitans are larger than the ones calculated and are probably close to those for the subsample of 12.

The Deficit

Having shown that the growth rates of the key variables for the other samples follow a pattern very similar to that of the 17 Major orchestras, it is interesting to see whether this is also true of the pattern of deficits previously noted for the 17 Majors. Figure 5-18 reveals some interesting facts.

(1) The other orchestras did not follow the path of the 17 Majors with regard to deficits. Note especially FY73, when all other orchestras saw a drastic slash in the deficit and even a dramatic surplus for the Metropolitans, the 17 increased the deficit. Another difference is the last two years, when the 17 reduced the annual deficit to almost zero.

(2) The smaller Metropolitans, which did not have the large accumulated endowment capital of the larger orchestras, showed a net surplus over the entire decade, while the Majors accumulated huge deficits, apparently eating heavily into their capital funds, as was shown previously for the 17 Majors.

(3) The 14 other Majors and the Regionals accumulated more than half of the decade's total deficit during the last three years; the Metropolitans, during the same period, accumulated a surplus almost equal to that of the entire decade.

These figures also shed some light on the effect of the Mellon and Challenge Grant programs. Although it appeared from the data on the 17 Majors that these two programs were largely responsible for the sharp reduction in annual deficits that occurred at the same time, it does not appear to be true for the orchestras as a whole. The fourteen other Major orchestras all received Mellon grants and six of them also received Challenge Grants; yet, this group had increasingly large deficits in the last two years. Apparently, the 17 Majors had an additional reason for decreasing the deficit. Perhaps they had already depleted too much of their capital funds in previous years. One thing is clear: it is impossible to obtain a complete picture of an organization's financial position without knowledge of the activity of its capital funds.

Number and Type of Performances and Artistic Personnel Costs

One additional important trend for the 17 Majors was the number and type of performances. It would be interesting to see whether this carried over to the

THE ANNUAL OPERATING DEFICIT/(SURPLUS): ALL ORCHESTRA SAMPLES
($ Thousands)

	The 17 Majors	14 Other Majors	All 31 Majors	The 15 Regionals	All 29 Regionals	The 12 Metropolitans	All 83 Metropolitans	All 143 Orchestras
FY70	1,962	714	2,676	189	279	76	387	3,341
FY71	1,713	661	2,374	310	354	(76)	(21)	2,707
FY72	2,024	1,362	3,386	240	319	(21)	42	3,747
FY73	2,429	577	3,006	23	(71)	(160)	(557)	2,378
FY74	1,704	678	2,382	401	632	(46)	(89)	2,925
FY75	2,569	1,601	4,170	159	428	97	196	4,794
FY76	2,151	1,849	4,000	419	668	72	(20)	4,649
FY77	3,205	2,767	5,972	973	1,284	(134)	(424)	6,832
FY78	533	3,528	4,061	803	1,264	(85)	(594)	4,731
FY79	92	2,170	2,262	1,731	2,161	(201)	(255)	4,168
Net Deficit (Surplus) Over The Decade	18,382	15,907	34,289	5,248	7,318	(478)	(1,335)	40,272

FIGURE 5-18

Regionals. Figure 5-19 shows data on the number and type of performances for the 15 Regionals.

A Comparison of Figure 5-19 with Tables 5-29 and 5-59 reveals that although unlike the 17 Majors, the total number of Regional orchestra performances just about doubled over the decade for this faster growing group and the two basic trends exhibited by the 17 Majors also prevailed for the 15 Regionals--growth in the number of performances until 1977, followed by a sharp decline and a shift over the decade toward a larger proportion of performances by less than the full orchestra. Just as with the 17 Majors, the switch had the effect not only of tempering the rise in costs, but also of decreasing the proportion of expenditures going to artistic personnel costs, especially noticeable toward the end of the decade, as shown in Figure 5-20 and Table 5-70.

Artistic Personnel Costs as Percentage of Total Expenditures
15 Regional Symphony Orchestras

FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
NA	61.9%	61.6%	63.6%	62.9%	62.0%	62.3%	60.6%	59.8%	57.3%

FIGURE 5-20

THE ENTIRE ORCHESTRA UNIVERSE: AN OVERVIEW

The data have shown that over the decade of the seventies, the Major, Regional, and Metropoliatan orchestras all followed a similar pattern of slow real growth, or roughly what Schwarz has called natural growth. The Majors and Regionals shifted toward a larger proportion of performances by less than the full orchestra over the decade and sharply reduced the total number of performances after FY77. This was perhaps influenced, or at least aided, by the NEA Challenge Grant and Mellon Grant programs which began disbursing funds at the same time. These programs might also have aided another development. At the end of the decade, the 17 Majors reduced their total annual operating deficits to almost zero and the Metropolitans accumulated surpluses. Unfortunately, the surplus/deficit issue is one important unsolved piece of the orchestra puzzle, because no data exist on the fund balances and transfers of these organizations.

TOTAL NUMBER OF PERFORMANCES
15 REGIONAL SYMPHONY ORCHESTRAS

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
By Full Orchestra	NA	747	684	752	822	800	823	874	921	778
By Ensemble	NA	639	562	1,027	1,268	1,866	2,049	2,566	1,599	1,949
TOTAL	NA	1,386	1,246	1,779	2,090	2,666	2,872	3,440	2,520	2,727

FIGURE 5-19

It has been shown in Chapter 3 that in terms of total expenditures, the Majors, Regionals, and Metroplitans make up more than 90 percent of the most widely defined orchestra universe. Hence, if the rest of the universe were added to those orchestras already studied in this chapter to obtain the entire universe, an economic picture similar to the one previously described would emerge, no matter what the behavior of the rest of the universe. Nevertheless, it would be interesting to know how the rest of the universe, the much smaller orchestras, behaved over the decade. Their contribution, though small in dollar terms, has probably been substantial in terms of numbers of performances and attendance figures.

Thus far, it has been shown that all groups of the 143 Orchestras behaved in approximately the same way, irrespective of budget level. This included the smaller Metropolitans, which relied heavily on in-kind contributions of player services (e.g., the orchestra player working a season for less than $2,000). Thus, the greater segment of the Metropolitans had characteristics similar to the even smaller orchestras, whch relied almost if not entirely on player contributions of services. If so, one could at least speculate, if not infer, that the rest of the orchestra universe behaved in a similar fashion.

There is an additional interesting point to be drawn from this chapter. The 17 Majors were seen to be representative not only of the 31 Majors, but indeed of all 143 Orchestras. If so, they can be used both for the more detailed variables over this decade and for variables going back in time.

TABLE 5

TOTAL TICKET INCOME - REGULAR HOME SUBSCRIPTION SERIES (RHSS) ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	8.3	8.7	9.7	10.6	10.6	12.8	14.0	15.8	17.7	19.7	Growth Rate: Standard Deviation:	10.82% 0.24
Dollars Deflated By Implicit GNP Deflator	8.3	8.3	8.8	9.2	8.5	9.3	9.5	10.2	10.8	11.0	Growth Rate: Standard Deviation:	3.54% 0.21
Dollars Deflated By Consumer Price Index	8.3	8.3	8.9	9.4	8.6	9.4	9.5	10.2	10.7	10.9	Growth Rate: Standard Deviation:	3.25% 0.22

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-2

TOTAL INCOME FROM PERFORMANCES IN HOME AREA ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	NA	15.3	16.5	17.1	17.8	21.7	23.7	26.9	30.6	33.3	Growth Rate: Standard Deviation:	10.80% 0.32
Dollars Deflated By Implicit GNP Deflator	NA	14.6	15.0	14.8	14.3	15.8	16.2	17.4	18.7	18.6	Growth Rate: Standard Deviation:	3.53% 0.25
Dollars Deflated By Consumer Price Index	NA	14.6	15.2	15.1	14.4	15.8	16.2	17.3	18.5	18.4	Growth Rate: Standard Deviation:	3.23% 0.24

Data deflated using indices readjusted to FY70 as the base; growth rates calculated over 9 years.
Source of Data: American Symphony Orchestra League

TABLE

TOTAL INCOME FROM PERFORMANCES OUTSIDE HOME AREA ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	NA	3.5	4.3	4.3	4.2	5.2	5.5	5.9	6.3	7.5	Growth Rate: Standard Deviation:	8.95% 0.35
Dollars Deflated By Implicit GNP Deflator	NA	3.3	3.9	3.8	3.4	3.8	3.8	3.8	3.8	4.2	Growth Rate: Standard Deviation:	1.80% 0.31
Dollars Deflated By Consumer Price Index	NA	3.3	3.9	3.8	3.4	3.8	3.8	3.8	3.8	4.1	Growth Rate: Standard Deviation:	1.51% 0.33

Data deflated using indices readjusted to FY70 as the base; growth rates calculated over 9 years.
Source of Data: American Symphony Orchestra League

TABLE 5-4

INCOME FROM BROADCASTING AND RECORDING ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.92	1.39	1.54	1.34	1.26	1.30	2.05	3.00	3.91	5.24	Growth Rate: Standard Deviation:	18.17% 1.51
Dollars Deflated By Implicit GNP Deflator	.92	1.32	1.40	1.16	1.01	.95	1.40	1.94	2.38	2.93	Growth Rate: Standard Deviation:	10.64% 1.40
Dollars Deflated By Consumer Price Index	.92	1.32	1.41	1.18	1.02	.95	1.40	1.93	2.36	2.89	Growth Rate: Standard Deviation:	10.41% 1.38

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5

OTHER EARNED INCOME ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79*		
Actual Dollars	NA	1.70	1.85	2.55	2.95	3.64	3.72	3.74	6.71	8.94	Growth Rate: Standard Deviation:	21.13 1.04
Dollars Deflated By Implicit GNP Deflator	NA	1.62	1.68	2.21	2.38	2.65	2.54	2.42	4.08	5.00	Growth Rate: Standard Deviation:	13.17 0.98
Dollars Deflated By Consumer Price Index	NA	1.62	1.70	2.25	2.39	2.65	2.53	2.40	4.05	4.93	Growth Rate: Standard Deviation:	12.85 0.98

*6 Symphonies reported double the amount (or more) reported in FY78.

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-6

TOTAL EARNED INCOME ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	20.1	21.9	24.2	25.3	26.2	31.9	35.0	39.5	47.6	55.9	Growth Rate: Standard Deviation:	11.69 0.35
Dollars Deflated By Implicit GNP Deflator	20.1	20.8	22.0	21.9	21.1	23.2	23.9	25.6	29.0	31.3	Growth Rate: Standard Deviation:	4.57 0.29
Dollars Deflated By Consumer Price Index	20.1	20.8	22.2	22.3	21.2	23.3	23.9	25.4	28.7	30.8	Growth Rate: Standard Deviation:	4.36 0.27

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE

TOTAL INCOME FROM ALL FUND RAISING ACTIVITIES* ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
ctual ollars	9.41	11.05	11.67	13.24	14.71	14.81	17.01	17.99	20.99	23.41	Growth Rate: Standard Deviation:	9.93% 0.19%
ollars Deflated By mplicit GNP Deflator	9.41	10.50	10.60	11.48	11.86	10.77	11.59	11.65	12.78	13.09	Growth Rate: Standard Deviation:	2.92% 0.23%
ollars Deflated By onsumer Price Index	9.41	10.51	10.71	11.68	11.91	10.80	11.58	11:58	12.66	12.91	Growth Rate: Standard Deviation:	2.71% 0.25%

Does not include either private or government grants; includes individual and business contributions and income from fund raising events.

ata deflated using indices readjusted to FY70 as the base.
ource of Data: American Symphony Orchestra League

TABLE 5-8

GRANT INCOME FROM FOUNDATIONS ($ Millions) ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
ctual ollars	2.55	2.60	.92	1.21	1.74	1.14	1.43	3.08	2.42	.58
ollars Deflated By mplicit GNP Deflator	2.55	2.47	.84	1.05	1.40	.83	.97	1.99	1.47	.32
ollars Deflated By onsumer Price Index	2.55	2.47	.85	1.07	1.41	.83	.97	1.98	1.46	.32

rowth Rates not reported because of reporting difference in 1979.
ata deflated using indices readjusted to FY70 as the base.
ource of Data: American Symphony Orchestra League

TABLE 5

GRANT INCOME FROM CORPORATIONS & BUSINESSES ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	.00	.08	.08	.23	.11	.21	.61	.41	.60	.00
Dollars Deflated By Implicit GNP Deflator	.00	.07	.07	.20	.09	.15	.42	.26	.36	.00
Dollars Deflated By Consumer Price Index	.00	.07	.07	.20	.09	.15	.42	.26	.36	.00

Growth Rates not calculated because of reported zeros. Much support income from businesses included in data in Table 9-7.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-10

TOTAL PRIVATE SUPPORT ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	11.96	13.82	12.76	14.75	16.63	16.71	19.15	21.79	24.14	26.29	Growth Rate: Standard Deviation:	9.15% 0.29%
Dollars Deflated By Implicit GNP Deflator	11.96	13.13	11.59	12.80	13.40	12.15	13.05	14.11	14.70	14.70	Growth Rate: Standard Deviation:	2.19% 0.27%
Dollars Deflated By Consumer Price Index	11.96	13.14	11.71	13.02	13.47	12.18	13.04	14.02	14.56	14.49	Growth Rate: Standard Deviation:	1.98% 0.26%

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE

LOCAL GOVERNMENT GRANTS* ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.78	1.78	1.88	1.98	2.38	2.55	2.60	2.74	3.32	3.31	Growth Rate: Standard Deviation:	8.04% .26
Dollars Deflated By Implicit GNP Deflator	1.78	1.69	1.70	1.71	1.92	1.86	1.77	1.77	2.02	1.85	Growth Rate: Standard Deviation:	1.15% .23
Dollars Deflated By Consumer Price Index	1.78	1.69	1.72	1.74	1.93	1.86	1.77	1.76	2.00	1.82	Growth Rate: Standard Deviation:	.94% .23

*Includes City, County, and Boards of Education Grants (with and without services required)
Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-12

STATE GOVERNMENT GRANTS* ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.33	1.10	.79	1.17	1.51	2.46	2.44	2.37	2.68	2.96	Growth Rate: Standard Deviation:	23.15% 1.90
Dollars Deflated By Implicit GNP Deflator	.33	1.04	.71	1.02	1.22	1.79	1.66	1.54	1.63	1.65	Growth Rate: Standard Deviation:	15.30% 1.80
Dollars Deflated By Consumer Price Index	.33	1.04	.72	1.03	1.23	1.80	1.66	1.53	1.62	1.63	Growth Rate: Standard Deviation:	15.06% 1.81

*Includes State Arts Councils and Other State Agency Grants (with and without services required)
Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE [illegible]

NATIONAL ENDOWMENT FOR THE ARTS GRANTS* ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	.44	1.02	1.88	1.91	2.64	2.63	2.77	2.74	4.04	6.73	Growth Rate: 25.18% Standard Deviation: 1.90
Dollars Deflated By Implicit GNP Deflator	.44	.97	1.71	1.66	2.13	1.91	1.89	1.77	2.46	3.77	Growth Rate: 17.20% Standard Deviation: 1.85
Dollars Deflated By Consumer Price Index	.44	.97	1.73	1.69	2.14	1.92	1.88	1.76	2.44	3.71	Growth Rate: 16.96% Standard Deviation: 1.87

*Includes Music Program and Challenge Grant Program Grants
Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-14

ALL FEDERAL GOVERNMENT GRANTS* ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	.64	1.41	2.19	2.22	2.95	2.91	3.03	3.29	4.11	7.05	Growth Rate: 21.38% Standard Deviation: 1.58
Dollars Deflated By Implicit GNP Deflator	.64	1.34	1.99	1.93	2.38	2.11	2.06	2.13	2.50	3.94	Growth Rate: 13.64% Standard Deviation: 1.54
Dollars Deflated By Consumer Price Index	.64	1.34	2.01	1.96	2.39	2.12	2.06	2.11	2.48	3.89	Growth Rate: 13.41% Standard Deviation: 1.55

*Includes National Endowment for the Arts Grants
Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5[illegible]5

TOTAL GOVERNMENT SUPPORT ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	2.74	4.31	4.88	5.48	6.97	7.94	8.10	8.40	10.24	13.49	Growth Rate: 15.94 Standard Deviation: 0.66
Dollars Deflated By Implicit GNP Index	2.74	4.10	4.44	4.75	5.62	5.77	5.52	5.44	6.24	7.54	Growth Rate: 8.55 Standard Deviation: 0.66
Dollars Deflated By Consumer Price Index	2.74	4.10	4.48	4.83	5.64	5.79	5.52	5.41	6.18	7.44	Growth Rate: 8.33 Standard Deviation: 0.68

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-16

TOTAL INCOME FROM ENDOWMENTS AND INVESTMENTS ($Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	5.26	5.51	6.99	7.61	7.82	8.26	8.29	8.97	10.07	12.47	Growth Rate: 8.56 Standard Deviation: 0.38
Dollars Deflated By Implicit GNP Deflator	5.26	5.24	6.35	6.61	6.30	6.00	5.65	5.81	6.13	6.97	Growth Rate: 1.64 Standard Deviation: 0.41
Dollars Deflated By Consumer Price Index	5.26	5.24	6.41	6.72	6.33	6.02	5.65	5.77	6.08	6.88	Growth Rate: 1.43 Standard Deviation: 0.43

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE [illegible]7

TOTAL INCOME FROM GRANTS AND ALLOCATIONS WITH SERVICES REQUIRED ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	2.27	3.77	4.00	5.24	6.82	8.64	8.60	9.18	9.13	11.03	Growth Rate: Standard Deviation:	17.28% 0.98
Dollars Deflated By Implicit GNP Deflator	2.27	3.59	3.63	4.54	5.50	6.28	5.86	5.95	5.56	6.17	Growth Rate: Standard Deviation:	9.81% 0.95
Dollars Deflated By Consumer Price Index	2.27	3.59	3.67	4.62	5.53	6.30	5.85	5.91	5.51	6.08	Growth Rate: Standard Deviation:	9.58% 0.98

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-18

TOTAL SUPPLEMENTAL INCOME* ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	17.7	19.9	20.6	22.6	24.6	24.3	26.9	30.0	35.3	41.2	Growth Rate: Standard Deviation:	8.87% 0.32
Dollars Deflated By Implicit GNP Deflator	17.7	18.9	18.7	19.6	19.8	17.6	18.4	19.4	21.5	23.1	Growth Rate: Standard Deviation:	1.93% 0.32
Dollars Deflated By Consumer Price Index	17.7	19.9	18.9	20.0	19.9	17.7	18.3	19.3	21.3	22.7	Growth Rate: Standard Deviation:	1.72% 0.31

*As defined by ASOL, this is contributed (support) income without Grants and Allocations with Services Required (i.e., Table 9-19 minus Table 9-17)

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-19

TOTAL SUPPORT INCOME ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	20.0	23.6	24.6	27.8	31.4	32.9	35.5	39.2	44.5	52.3	Growth Rate: 10.3 Standard Deviation: 0.1
Dollars Deflated By Implicit GNP Deflator	20.0	22.5	22.4	24.2	25.3	23.9	24.2	25.4	27.1	29.2	Growth Rate: 3.2 Standard Deviation: 0.2
Dollars Deflated By Consumer Price Index	20.0	22.5	22.6	24.6	25.4	24.0	24.2	25.2	26.8	28.8	Growth Rate: 3.0 Standard Deviation: 0.2

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-20

TOTAL INCOME ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	40.1	45.5	48.8	53.1	57.6	64.8	70.6	78.7	92.1	108.2	Growth Rate: 10.9 Standard Deviation: 0.2
Dollars Deflated By Implicit GNP Deflator	40.1	43.3	44.4	46.1	46.4	47.1	48.1	50.1	56.0	60.5	Growth Rate: 3.9 Standard Deviation: 0.1
Dollars Deflated By Consumer Price Index	40.1	43.3	44.8	46.9	46.7	47.3	48.0	50.6	55.5	59.6	Growth Rate: 3.7 Standard Deviation: 0.1

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE [illegible]

ARTISTIC PERSONNEL EXPENSES ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
ctual ollars	NA	28.45	29.66	33.03	36.00	40.39	43.92	48.82	53.45	58.16	Growth Rate: 9.80% Standard Deviation: 0.10
ollars Deflated By nplicit GNP Deflator	NA	27.04	26.95	28.65	29.02	29.37	29.93	31.62	32.54	32.53	Growth Rate: 2.59% Standard Deviation: 0.09
ollars Deflated By onsumer Price Index	NA	27.06	27.23	29.16	29.16	29.45	29.90	31.42	32.24	32.06	Growth Rate: 2.29% Standard Deviation: 0.09

rowth Rate Calculated over 9 years.
ata deflated using indices readjusted to FY70 as the base.
ource of Data: American Symphony Orchestra League

TABLE 5-22

CONCERT PRODUCTION EXPENSES* ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
ctual Dollars	NA	13.03	15.45	16.11	16.05	18.94	19.80	22.97	27.38	24.31	Growth Rate: 8.93% Standard Deviation: 0.42
Dollars Deflated By nplicit GNP Deflator	NA	12.38	14.04	13.98	12.93	13.78	13.49	14.88	16.67	13.60	Growth Rate: 1.78% Standard Deviation: 0.43
Dollars Deflated By Consumer Price Index	NA	12.39	14.19	14.22	13.00	13.81	13.48	14.79	16.51	13.40	Growth Rate: 1.48% Standard Deviation: 0.43

*Includes Other Direct Costs
Growth Rate calculated over 9 years.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE

FUND RAISING EXPENSES ($ Thousands)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
ctual ollars	NA	864	837	998	1,010	1,177	1,386	1,645	1,986	NA
ollars Deflated By plicit GNP Deflator	NA	821	761	866	814	856	944	1,065	1,209	NA
ollars Deflated By onsumer Price Index	NA	821	768	881	818	858	944	1,059	1,196	NA

o Growth Rates shown because of differently reported data in 1979.
ata deflated using indices readjusted to FY70 as the base.
urce of Data: American Symphony Orchestra League

TABLE 5-24

GENERAL AND ADMINISTRATIVE EXPENSES ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
ctual ollars	3.96	4.91	4.89	5.43	6.25	6.86	7.61	8.44	9.77	12.07	Growth Rate: Standard Deviation:	11.97% 0.28
ollars Deflated By plicit GNP Deflator	3.96	4.67	4.44	4.71	5.04	4.99	5.19	5.47	5.95	6.75	Growth Rate: Standard Deviation:	4.84% 0.25
ollars Deflated By onsumer Price Index	3.96	4.67	4.49	4.79	5.06	5.00	5.18	5.43	5.89	6.65	Growth Rate: Standard Deviation:	4.62% 0.24

ata deflated using indices readjusted to FY70 as the base.
urce of Data: American Symphony Orchestra League

TABLE 5[illegible]

TOTAL EXPENDITURES ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	42.1	47.3	50.8	55.6	59.3	67.4	72.7	81.9	92.6	108.2	Growth Rate: Standard Deviation:	10.5% 0.17
Dollars Deflated By Implicit GNP Deflator	42.1	44.9	46.2	48.2	47.8	49.0	49.6	53.0	56.4	60.5	Growth Rate: Standard Deviation:	3.5% 0.15
Dollars Deflated By Consumer Price Index	42.1	44.9	46.7	49.1	48.0	49.1	49.5	52.7	55.8	59.7	Growth Rate: Standard Deviation:	3.3% 0.15

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-26

DEFICIT FROM OPERATIONS ($ Thousands)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars (000's)	1,962	1,713	2,024	2,429	1,704	2,569	2,151	3,205	533	92
Dollars Deflated By Implicit GNP Deflator	1,962	1,628	1,838	2,108	1,373	1,868	1,466	2,075	324	51
Dollars Deflated By Consumer price Index	1,962	1,629	1,857	2,145	1,380	1,873	1,465	2,062	321	51

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5

EARNINGS GAP ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	21.9	25.4	26.7	30.3	33.1	35.5	37.7	42.4	45.0	52.4	Growth Rate: 9.45% Standard Deviation: 0.14%
Dollars Deflated By Implicit GNP Deflator	21.9	24.1	24.2	26.3	26.7	25.8	25.7	27.4	27.4	29.3	Growth Rate: 2.47% Standard Deviation: 0.18%
Dollars Deflated By Consumer Price Index	21.9	24.1	24.5	26.7	26.8	25.9	25.7	27.3	27.1	28.9	Growth Rate: 2.26% Standard Deviation: 0.21%

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-28

NUMBER OF PERFORMANCES BY FULL ORCHESTRA - REGULAR HOME SUBSCRIPTION SERIES (RHSS)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Number of Performances	NA	855	867	936	909	968	999	1,018	1,090	1,057	Growth Rate: 3.04% Standard Deviation: 0.14

Growth Rate calculated over 9 years.
Source of Data: American Symphony Orchestra League

TABLE 5

TOTAL NUMBER OF PERFORMANCES
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
y Full rchestra	NA	2,939	2,890	2,956	2,892	3,053	3,115	2,789	2,770	2,133
y Ensemble	NA	276	571	599	731	610	483	1,141	845	1,010
otal	NA	3,215	3,461	3,555	3,623	3,663	3,598	3,930	3,615	3,143

Growth Rate: 0.39%
Standard Deviation: .40

In FY77, ASOL began a new category, "Split Orchestra with Conductor", which we have included in "Ensemble". Comparisons between FY76 and FY77 should be made with care.

ource of Data: American Symphony Orchestra League

TABLE 5-30

TOTAL SEASON ATTENDANCE - REGULAR HOME SUBSCRIPTION SERIES (RHSS)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
ttendance n Thousands	2,047	2,373	2,173	2,287	2,243	2,389	2,490	2,521	2,628	2,598

Growth Rate: 2.4%
Standard Deviation: 0.19

ource of Data: American Symphony Orchestra League

TABLE 5

TOTAL ATTENDANCE - ALL PERFORMANCES (In Thousands)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
By Full Orchestra	NA	7,257	7,693	7,939	8,151	8,158	8,780	8,521	8,503	6,834	
By Ensemble	NA	288	479	515	389	456	393	858	946	900	
Total	NA	7,545	8,172	8,454	8,540	8,614	9,173	9,379	9,449	7,734	Growth Rate: 1.37% Standard Deviation: 0.43

In FY77, ASOL began a new category, "Split Orchestra with Conductor", which we have included in "Ensemble". Comparisons between FY76 and FY77 should be made with care.
Source of Data: American Symphony Orchestra League

TABLE 5-32

AVERAGE TICKET PRICE - REGULAR HOME SUBSCRIPTION SERIES (RHSS)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	4.04	4.10	4.45	4.64	4.72	5.37	5.63	6.27	6.73	7.59	Growth Rate: 7.26% Standard Deviation: 0.20
Dollars Deflated By Implicit GNP Deflator	4.04	3.90	4.04	4.03	3.80	3.90	3.84	4.06	4.10	4.24	Growth Rate: 0.42% Standard Deviation: 0.16
Dollars Deflated By Consumer Price Index	4.04	3.90	4.08	4.10	3.82	3.92	3.83	4.04	4.06	4.18	Growth Rate: 0.22% Standard Deviation: 0.15

Data deflated using indicies readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-33

NUMBERS OF PLAYERS REGULARLY EMPLOYED
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
mber of ayers	1,633	1,629	1,626	1,627	1,639	1,638	1,640	1,642	1,637	1,645	Growth Rate: Standard Deviation:	0.11% 0.01

urce of Data: American Symphony Orchestra League

TABLE 5-34

AVERAGE WEEKLY SALARY OF PLAYERS REGULARLY EMPLOYED
17 Major Symphony Orchestras: Average Per Player

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
tual llars	258.67	274.50	289.20	305.90	328.06	346.28	373.37	400.22	435.42	465.29	Growth Rate: Standard Deviation:	6.76% 0.07
llars Deflated By plicit GNP Deflator	258.67	260.88	262.74	265.40	264.39	251.80	254.43	259.21	265.06	260.23	Growth Rate: Standard Deviation:	-0.05% 0.09
llars Deflated By nsumer Price Index	258.67	261.06	265.44	270.06	265.66	252.50	254.22	257.57	262.59	256.61	Growth Rate: Standard Deviation:	0.25% 0.10

ta deflated using indices readjusted to FY70 as the base.
urce of Data: American Symphony Orchestra League

TABLE 5-35

INCOME FROM PERFORMANCES IN HOME AREA ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
ctual ollars	NA	20.17	22.0	22.84	24.87	29.49	33.12	37.65	43.30	47.37	Growth Rate: Standard Deviation:	11.87% 0.27
ollars Deflated By mplicit GNP Deflator	NA	19.17	19.99	19.82	20.04	21.45	22.57	24.38	26.36	26.49	Growth Rate: Standard Deviation:	4.53% 0.21
ollars Deflated By onsumer Price Index	NA	19.19	20.19	20.17	20.14	21.51	22.55	24.23	26.11	26.12	Growth Rate: Standard Deviation:	4.23% 0.19

ata deflated using indices readjusted to FY70 as the base; growth rates calculated over 9 years. Growth rates are slightly high due to missing data in early years.

ource of Data: American Symphony Orchestra League

TABLE 5-36

INCOME FROM PERFORMANCES OUTSIDE HOME AREA ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
ctual ollars	NA	5.42	6.32	6.59	6.67	8.08	8.61	9.06	9.89	11.18	Growth Rate: Standard Deviation:	8.93% 0.23
ollars Deflated By mplicit GNP Deflator	NA	5.15	5.74	5.72	5.37	5.88	5.87	5.87	6.02	6.25	Growth Rate: Standard Deviation:	1.78% 0.20
ollars Deflated By onsumer Price Index	NA	5.16	5.80	5.82	5.40	5.90	5.86	5.83	5.96	6.16	Growth Rate: Standard Deviation:	1.49% 0.22

ata deflated using indices readjusted to FY70 as the base; growth rates calculated over 9 years. Growth rates are slightly high due to missing data in early years.

ource of Data: American Symphony Orchestra League

TABLE 5

INCOME FROM BROADCASTING AND RECORDING ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	F[illegible]		
Actual Dollars	1.60	2.06	2.07	2.06	2.26	2.09	3.95	4.39	5.46	7.23	Growth Rate: Standard Deviation:	17.08% 1.12
Dollars Deflated By Implicit GNP Deflator	1.60	1.95	1.88	1.79	1.83	1.52	2.[illegible]9	2.84	3.32	4.04	Growth Rate: Standard Deviation:	9.62% 1.02
Dollars Deflated By Consumer Price Index	1.60	1.96	1.90	1.82	1.83	1.52	2.69	2.83	3.29	3.99	Growth Rate: Standard Deviation:	9.40% 1.00

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-38

OTHER EARNED INCOME ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	NA	2.56	2.71	3.54	3.98	5.35	5.39	5.46	8.45	11.22	Growth Rate: Standard Deviation:	19.11% .79
Dollars Deflated By Implicit GNP Deflator	NA	2.44	2.46	3.07	3.21	3.89	3.67	3.54	5.15	6.27	Growth Rate: Standard Deviation:	11.29% .72
Dollars Deflated By Consumer Price Index	NA	2.44	2.48	3.12	3.22	3.90	3.67	3.51	5.10	6.18	Growth Rate: Standard Deviation:	10.98% .72

Data deflated using indices readjusted to FY70 as the base. Growth rates are slightly high due to missing data in early years.
Source of Data: American Symphony Orchestra League

TABLE 5-39

TOTAL EARNED INCOME ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	28.80	30.76	33.32	35.52	37.78	45.01	51.07	56.56	67.10	78.20	Growth Rate: 11.7% Standard Deviation: .31
Dollars Deflated By Implicit GNP Deflator	28.80	29.23	30.27	30.82	30.45	32.73	34.80	36.63	40.85	43.73	Growth Rate: 4.65% Standard Deviation: .23
Dollars Deflated By Consumer Price Index	28.80	29.25	30.58	31.36	30.59	32.82	34.77	36.40	40.47	43.11	Growth Rate: 4.43% Standard Deviation: .21

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-40

TOTAL INCOME FROM ALL FUND RAISING ACTIVITIES* ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	13.69	15.45	17.00	19.62	22.28	22.18	24.94	26.74	30.73	35.61	Growth Rate: 10.45% Standard Deviation: .21
Dollars Deflated By Implicit GNP Deflator	13.69	14.69	15.44	17.02	17.95	16.13	17.00	17.32	18.70	19.91	Growth Rate: 3.41% Standard Deviation: .26
Dollars Deflated By Consumer Price Index	13.69	14.70	15.60	17.32	18.04	16.17	16.98	17.21	18.53	19.63	Growth Rate: 3.19% Standard Deviation: .27

*Does not include either private or government grants; includes individual and business contributions and income from fund raising events. Growth rates are slightly high due to missing data in early years.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE [illegible]1

GRANTS FROM FOUNDATIONS ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	4.05	4.22	1.17	1.31	2.00	1.45	1.57	3.36	2.56	.80
Dollars Deflated By Implicit GNP Deflator	4.05	4.01	1.07	1.14	1.61	1.05	1.07	2.17	1.56	.45
Dollars Deflated By Consumer Price Index	4.05	4.01	1.08	1.16	1.62	1.06	1.07	2.16	1.55	.44

No Growth Rates reported because of reporting difference in 1979.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-42

GRANTS FROM BUSINESSES AND CORPORATIONS ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	.00	.12	.13	.24	.17	.32	.70	.48	.95	.00
Dollars Deflated By Implicit GNP Deflator	.00	.12	.12	.21	.14	.24	.48	.31	.58	.00
Dollars Deflated By Consumer Price Index	.00	.12	.12	.21	.14	.24	.48	.31	.57	.00

No Growth Rates reported because of zeros. Much support from business included in data in Table 9-40.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE [illegible]

TOTAL PRIVATE SUPPORT ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	17.74	19.97	18.49	21.36	24.75	24.66	27.58	31.22	34.88	37.30	Growth Rate: Standard Deviation:	8.84 .23
Dollars Deflated By Implicit GNP Deflator	17.74	18.98	16.80	18.53	19.94	17.93	18.79	20.22	21.23	20.86	Growth Rate: Standard Deviation:	1.90 .25
Dollars Deflated By Consumer Price Index	17.74	18.99	16.97	18.85	20.04	17.98	18.78	20.09	21.04	20.56	Growth Rate: Standard Deviation:	1.69 .24

Data deflated using indices readjusted to FY70 as the base. Growth Rates are slightly high due to missing data in early years.
Source of Data: American Symphony Orchestra League

TABLE 5-44

LOCAL GOVERNMENT GRANTS* ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	2.40	2.32	2.84	2.90	3.57	3.83	4.08	4.14	4.89	4.90	Growth Rate: Standard Deviation:	9.27 .30
Dollars Deflated By Implicit GNP Deflator	2.40	2.21	2.58	2.52	2.88	2.79	2.78	2.68	2.98	2.74	Growth Rate: Standard Deviation:	2.30 .30
Dollars Deflated By Consumer Price Index	2.40	2.21	2.31	2.56	2.89	2.80	2.78	2.67	2.95	2.70	Growth Rate: Standard Deviation:	2.09 .32

*Includes City, County, and Board of Education Grants (with and without services required)
Data deflated using indices readjusted to FY70 as the base. Growth Rates are slightly high due to missing data in early years.
Source of Data: American Symphony Orchestra League

TABLE [illegible]5

STATE GOVERNMENT GRANTS* ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	.82	1.85	1.91	2.12	3.57	5.24	5.36	5.66	6.47	7.55	Growth Rate: 25.40 Standard Deviation: 1.38
Dollars Deflated By Implicit GNP Deflator	.82	1.75	1.73	1.84	2.88	3.81	3.66	3.67	3.94	4.22	Growth Rate: 17.41 Standard Deviation: 1.31
Dollars Deflated By Consumer Price Index	.82	1.76	1.75	1.87	2.89	3.82	3.65	3.64	3.90	4.16	Growth Rate: 17.18 Standard Deviation: 1.32

*Includes State Arts Councils and Other State Agency Grant (with and without services required)
Data deflated using indices readjusted to FY70 as the base. Growth Rates are slightly high due to missing data in early years.
Source of Data: American Symphony Orchestra League

5-63

TABLE 5-46

NATIONAL ENDOWMENT FOR THE ARTS GRANTS* ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	.68	1.81	3.01	3.03	4.37	4.48	4.77	4.92	6.85	10.44	Growth Rate: 25.73 Standard Deviation: 1.91
Dollars Deflated By Implicit GNP Deflator	.68	1.72	2.74	2.63	3.52	3.26	3.25	3.19	4.17	5.84	Growth Rate: 17.72 Standard Deviation: 1.86
Dollars Deflated By Consumer Price Index	.68	1.72	2.76	2.68	3.54	3.27	3.25	3.17	4.13	5.76	Growth Rate: 17.47 Standard Deviation: 1.88

*Includes Music Program and Challenge Grant Program Grants.
Data deflated using indices readjusted to FY70 as the base. Growth rates are slightly high due to missing data in early years.
Source of Data: American Symphony Orchestra League

TABLE

ALL FEDERAL GOVERNMENT GRANTS* ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
ctual ollars	.88	2.20	3.32	3.35	4.71	4.78	5.05	5.48	6.95	10.82	Growth Rate: 23.18% Standard Deviation: 1.67
ollars Deflated By nplicit GNP Deflator	.88	2.09	3.02	2.90	3.79	3.48	3.43	3.55	4.23	6.05	Growth Rate: 15.33% Standard Deviation: 1.63
ollars Deflated By onsumer Price Index	.88	2.09	3.05	2.96	3.81	3.49	3.43	3.53	4.19	5.96	Growth Rate: 15.09% Standard Deviation: 1.65

Includes National Endowment for the Arts Grants

Data deflated using indices readjusted to FY70 as the base. Growth Rates are slightly high due to missing data in early years.

Source of Data: American Symphony Orchestra League

TABLE 5-48

TOTAL GOVERNMENT SUPPORT ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
ctual ollars	4.10	6.40	8.13	8.51	11.98	13.88	14.53	15.30	18.43	23.44	Growth Rate: 18.50% Standard Deviation: .73
ollars Deflated By nplicit GNP Deflator	4.10	6.08	7.39	7.38	9.66	10.09	9.90	9.91	11.22	13.11	Growth Rate: 10.95% Standard Deviation: .73
ollars Deflated By onsumer Price Index	4.10	6.09	7.46	7.51	9.70	10.12	9.89	9.84	11.12	12.92	Growth Rate: 10.72% Standard Deviation: .75

ata deflated using indices readjusted to FY70 as the base. Growth Rates are slightly high due to missing data in early years.

ource of Data: American Symphony Orchestra League

TABLE

INCOME FROM ENDOWMENTS AND INVESTMENTS ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	Growth Rate:	Standard Deviation:
Actual Dollars	6.88	7.24	9.31	9.66	10.55	11.31	11.25	12.44	13.59	16.03	8.85	0.32
Dollars Deflated By Implicit GNP Deflator	6.88	6.88	8.46	8.38	8.51	8.23	7.67	8.06	8.28	8.96	1.91	0.35
Dollars Deflated By Consumer Price Index	6.88	6.89	8.55	8.53	8.55	8.25	7.66	8.00	8.20	8.84	1.70	0.38

Data deflated using indices readjusted to FY70 as the base. Growth Rates are slightly high due to missing data in early years.
Source of Data: American Symphony Orchestra League

TABLE 5-50

TOTAL SUPPORT INCOME ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	Growth Rate:	Standard Deviation:
Actual Dollars	28.97	35.17	36.70	40.80	47.28	49.86	53.35	58.95	66.91	80.62	10.81	0.22
Dollars Deflated By Implicit GNP Deflator	28.97	33.42	33.35	35.39	38.11	36.25	36.36	38.18	40.73	45.09	3.75	0.24
Dollars Deflated By Consumer Price Index	28.97	33.45	33.69	36.02	38.29	36.35	36.33	37.94	40.35	44.45	3.54	0.25

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5[illegible]

TOTAL INCOME ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	57.77	65.93	70.03	76.32	85.07	94.87	104.22	115.52	134.01	158.82	Growth Rate: Standard Deviation:	11.27 0.19
Dollars Deflated By Implicit GNP Deflator	57.77	62.65	63.62	6[illegible].21	68.56	68.98	71.16	74.82	81.58	88.83	Growth Rate: Standard Deviation:	4.18 0.16
Dollars Deflated By Consumer Price Index	57.77	62.70	64.27	67.38	68.89	69.18	71.10	74.34	80.82	87.56	Growth Rate: Standard Deviation:	3.96 0.16

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-52

ARTISTIC PERSONNEL EXPENSES ($ Millions)
17 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	NA	39.56	42.71	46.52	52.79	59.15	64.75	72.33	79.44	86.95	Growth Rate: Standard Deviation:	10.70% .09
Dollars Deflated By Implicit GNP Deflator	NA	37.60	38.80	40.36	42.55	43.01	44.12	46.84	48.36	48.63	Growth Rate: Standard Deviation:	3.43% .08
Dollars Deflated By Consumer Price Index	NA	37.62	39.20	41.07	42.75	43.13	44.09	46.55	47.91	47.94	Growth Rate: Standard Deviation:	3.14% .09

Data deflated using indices readjusted to FY70 as the base. Growth Rates are slightly high due to missing data in early years.
Source of Data: American Symphony Orchestra League

TABLE 5[illegible]

CONCERT PRODUCTION EXPENSES* ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	NA	18.67	21.24	21.80	23.90	27.65	29.93	33.34	40.41	36.09	Growth Rate: 9.8 Standard Deviation: .3
Dollars Deflated By Implicit GNP Deflator	NA	17.75	19.29	18.92	19.26	20.11	20.39	21.59	24.60	20.19	Growth Rate: 2.6 Standard Deviation: .3
Dollars Deflated By Consumer Price Index	NA	17.76	19.49	19.25	19.35	20.16	20.38	21.46	24.37	19.90	Growth Rate: 2.3 Standard Deviation: .3

*Includes Other Direct Costs.
Growth Rate calculated over 9 years.
Data deflated using indices readjusted to FY70 as the base. Growth Rates are slightly high due to missing data in early years.
Source of Data: American Symphony Orchestra League

TABLE 5-54

FUND RAISING EXPENSES ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	NA	1.16	1.22	1.37	1.45	1.87	2.16	2.56	3.39	NA
Dollars Deflated By Implicit GNP Deflator.30	NA	1.10	1.10	1.19	1.17	1.36	1.47	1.66	2.06	NA
Dollars Deflated By Consumer Price Index	NA	1.10	1.12	1.21	1.17	1.36	1.47	1.65	2.04	NA

No growth rates shown because of differently reported data in 1979.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5

GENERAL AND ADMINISTRATIVE EXPENSES ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	5.71	6.85	7.27	7.82	9.31	10.37	11.58	13.26	14.83	18.58	Growth Rate: Standard Deviation:	13.10 .23
Dollars Deflated By Implicit GNP Deflator	5.71	6.51	6.61	6.78	7.50	7.54	7.89	8.59	9.03	10.39	Growth Rate: Standard Deviation:	5.89 .19
Dollars Deflated By Consumer Price Index	5.71	6.52	6.68	6.90	7.54	7.56	7.89	8.53	8.94	10.24	Growth Rate: Standard Deviation:	5.67 .18

Data deflated using indices readjusted to FY70 as the base. Growth Rates are slightly high due to missing data in early years.
Source of Data: American Symphony Orchestra League

TABLE 5-56

TOTAL EXPENDITURES ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	60.45	68.30	73.41	79.32	87.45	99.04	108.42	121.49	138.07	161.08	Growth Rate: Standard Deviation:	11.07 .16
Dollars Deflated By Implicit GNP Deflator	60.45	64.91	66.70	68.82	70.48	72.02	73.88	78.68	84.05	90.09	Growth Rate: Standard Deviation:	3.99 .13
Dollars Deflated By Consumer Price Index	60.45	64.95	67.38	70.03	70.81	72.22	73.82	78.19	83.27	88.80	Growth Rate: Standard Deviation:	3.78 .13

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-57

DEFICIT FROM OPERATIONS ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	2.68	2.37	3.39	3.01	2.38	4.17	4.00	5.97	4.06	2.26
Dollars Deflated By Implicit GNP Deflator	2.68	2.26	3.08	2.61	1.92	3.03	2.73	3.87	2.47	1.27
Dollars Deflated By Consumer Price Index	2.68	2.26	3.11	2.65	1.93	3.04	2.72	3.84	2.45	1.25

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-58

EARNINGS GAP ($ Millions)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	31.65	37.54	40.09	43.80	49.67	54.03	57.35	64.92	70.97	82.88	Growth Rate: Standard Deviation:	10.4 .1
Dollars Deflated By Implicit GNP Deflator	31.65	35.68	36.42	38.00	40.03	39.29	39.08	42.05	43.20	46.36	Growth Rate: Standard Deviation:	3.4 .1
Dollars Deflated By Consumer Price Index	31.65	35.70	36.80	38.67	40.22	39.39	39.05	41.78	42.30	45.69	Growth Rate: Standard Deviation:	3.2 .1

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE

TOTAL NUMBR OF PERFORMANCES
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
By Full Orchestra	NA	4,473	4,473	4,527	4,723	4,909	5,314	4,902	4,833	3,730
By Ensemble	NA	1,332	1,912	1,449	1,404	1,399	889	2,004	2,111	1,761
Total	NA	5,805	6,385	5,976	6,127	6,308	6,203	6,906	6,944	5,491

Growth Rate: 0.55%
Standard Deviation: .45

*In FY77, ASOL began a new category, "Split Orchestra with Conductor", which we have included in "Ensemble". Comparisons between FY76 and FY77 should be made with care. Growth rates are calculated over 9 years and are slightly high due to missing data in early years.

Source of Data: American Symphony Orchestra League

TABLE 5-60

TOTAL SEASON ATTENDANCE - ALL PERFORMANCES (in Thousands)
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
By Full Orchestra	NA	10,191	11,335	11,195	12,071	12,312	13,439	12,804	12,589	10,049
By Ensemble	NA	303	632	697	604	730	606	1,318	1,472	1,184
Total	NA	10,494	11,967	11,892	12,675	13,042	14,045	14,122	14,061	11,233

Growth Rate: 2.02%
Standard Deviation: .56

Growth Rates are slightly high due to missing data in early years and are calculated over 9 years.
Source of Data: American Symphony Orchestra League

TABLE

NUMBER OF PLAYERS REGULARLY EMPLOYED
31 Major Symphony Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Number of Players	2,587	2,471	2,668	2,581	2,754	2,778	2,782	2,772	2,781	2,792

Growth Rate: 1.18
Standard Deviation: .12

Source of Data: American Symphony Orchestra League

TABLE [illegible]

INCOME FROM PERFORMANCES IN HOME AREA ($ Millions)
15 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	NA	1.86	2.08	2.56	3.10	3.54	3.91	4.60	5.47	6.17	Growth Rate: 16.37% Standard Deviation: .21
Dollars Deflated By Implicit GNP Deflator	NA	1.77	1.89	2.22	2.50	2.57	2.66	2.98	3.33	3.45	Growth Rate: 8.73% Standard Deviation: .24
Dollars Deflated By Consumer Price Index	NA	1.77	1.91	2.26	2.51	2.58	2.66	2.96	3.30	3.40	Growth Rate: 8.42% Standard Deviation: .26

Growth Rates calculated over 9 years.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-63

INCOME FROM PERFORMANCES OUTSIDE HOME AREA ($ Millions)
15 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	NA	.22	.20	.25	.35	.32	.51	.53	.84	.71	Growth Rate: 20.01% Standard Deviation: 1.01
Dollars Deflated By Implicit GNP Deflator	NA	.21	.18	.21	.28	.23	.34	.35	.51	.40	Growth Rate: 12.13% Standard Deviation: .95
Dollars Deflated By Consumer Price Index	NA	.21	.19	.22	.28	.23	.34	.34	.51	.39	Growth Rate: 11.81% Standard Deviation: .94

Growth Rates calculated over 9 years.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-64

TOTAL EARNED INCOME ($ Millions)
15 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	2.07	2.27	2.46	3.05	3.74	4.22	4.76	5.50	6.68	7.36	Growth Rate: 15.97 Standard Deviation: .22
Dollars Deflated By Implicit GNP Deflator	2.07	2.15	2.24	2.64	3.01	3.07	3.24	3.56	4.07	4.12	Growth Rate: 8.58 Standard Deviation: .21
Dollars Deflated By Consumer Price Index	2.07	2.16	2.26	2.69	3.03	3.08	3.24	3.54	4.03	4.06	Growth Rate: 8.36 Standard Deviation: .22

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-65

TOTAL PRIVATE SUPPORT ($ Millions)
15 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	2.56	2.65	2.37	2.70	2.87	3.34	3.69	4.29	5.02	5.39	Growth Rate: 9.67 Standard Deviation: .51
Dollars Deflated By Implicit GNP Deflator	2.56	2.52	2.15	2.34	2.31	2.43	2.52	2.78	3.05	3.02	Growth Rate: 2.68 Standard Deviation: .42
Dollars Deflated By Consumer Price Index	2.56	2.52	2.18	2.38	2.32	2.44	2.51	2.76	3.03	2.97	Growth Rate: 2.47 Standard Deviation: .39

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-66

TOTAL GOVERNMENT SUPPORT ($ Millions)
15 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.24	.41	.47	.70	1.08	1.20	1.53	1.43	1.92	2.04	Growth Rate: Standard Deviation:	25.80 1.17
Dollars Deflated By Implicit GNP Deflator	.24	.39	.43	.61	.87	.88	1.04	.93	1.17	1.14	Growth Rate: Standard Deviation:	17.78 1.14
Dollars Deflated By Consumer Price Index	.24	.39	.43	.62	.88	.88	1.04	.92	1.16	1.13	Growth Rate: Standard Deviation:	17.54 1.17

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-67

INCOME FROM ENDOWMENT AND INVESTMENTS ($ Millions)
15 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.58	.65	.95	1.24	1.30	1.32	1.14	1.28	1.36	1.46	Growth Rate: Standard Deviation:	9.40 .96
Dollars Deflated By Implicit GNP Deflator	.58	.62	.86	1.07	1.05	.96	.78	.83	.83	.82	Growth Rate: Standard Deviation:	2.43 .98
Dollars Deflated By Consumer Price Index	.58	.62	.87	1.09	1.05	.96	.78	.83	.82	.80	Growth Rate: Standard Deviation:	2.22 1.01

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE [illegible]

TOTAL SUPPORT INCOME ($ Millions)
15 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	3.38	3.71	3.79	4.64	5.25	5.86	6.36	7.01	8.30	9.33	Growth Rate: 12.13 Standard Deviation: .20
Dollars Deflated By Implicit GNP Deflator	3.38	3.53	3.45	4.02	4.23	4.26	4.33	4.54	5.05	5.22	Growth Rate: 4.98 Standard Deviation: .18
Dollars Deflated By Consumer Price Index	3.38	3.53	3.48	4.10	4.25	4.28	4.33	4.51	5.01	5.14	Growth Rate: 4.77 Standard Deviation: .19

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-69

TOTAL INCOME ($ Millions)
15 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	5.45	5.98	6.26	7.68	8.98	10.08	11.12	12.51	14.98	16.69	Growth Rate: 13.70 Standard Deviation: .19
Dollars Deflated By Implicit GNP Deflator	5.45	5.68	5.68	6.67	7.24	7.33	7.58	8.10	9.12	9.33	Growth Rate: 6.45 Standard Deviation: .18
Dollars Deflated By Consumer Price Index	5.45	5.69	5.74	6.78	7.27	7.35	7.57	8.05	9.04	9.20	Growth Rate: 6.23 Standard Deviation: .19

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE [illegible]0

ARTISTIC PERSONNEL EXPENSES ($ Millions)
15 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	NA	3.90	4.00	4.90	5.90	6.35	7.19	8.18	9.44	10.55	Growth Rate: 13.8 Standard Deviation: .2
Dollars Deflated By Implicit GNP Deflator	NA	3.70	3.64	4.25	4.76	4.62	4.90	5.30	5.75	5.90	Growth Rate: 6.3 Standard Deviation: .2
Dollars Deflated By Consumer Price Index	NA	3.71	3.68	4.33	4.78	4.63	4.89	5.26	5.69	5.82	Growth Rate: 6.0 Standard Deviation: .2

Growth Rates calculated over 9 years.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-71

TOTAL EXPENDITURES ($ Millions)
15 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	5.64	6.29	6.50	7.71	9.38	10.24	11.54	13.49	15.79	18.42	Growth Rate: 14.2 Standard Deviation: .2
Dollars Deflated By Implicit GNP Deflator	5.64	5.98	5.90	6.69	7.56	7.45	7.86	8.74	9.61	10.30	Growth Rate: 7.0 Standard Deviation: .2
Dollars Deflated By Consumer Price Index	5.64	5.98	5.96	6.81	7.60	7.47	7.86	8.68	9.52	10.16	Growth Rate: 6.7 Standard Deviation: .1

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE

DEFICIT FROM OPERATIONS ($ Thousands)
15 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	189	310	240	24	401	159	419	973	802	1,731
Dollars Deflated By Implicit GNP Deflator	189	295	218	21	323	116	286	630	488	968
Dollars Deflated By Consumer Price Index	189	293	220	21	325	116	285	626	484	954

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-73

EARNINGS GAP ($ Millions)
15 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	3.57	4.02	4.03	4.66	5.65	6.02	6.78	7.98	9.11	11.06	Growth Rate: Standard Deviation:	13.22% .29
Dollars Deflated By Implicit GNP Deflator	3.57	3.82	3.66	4.05	4.55	4.38	4.62	5.17	5.54	6.19	Growth Rate: Standard Deviation:	6.01% .24
Dollars Deflated By Consumer Price Index	3.57	3.83	3.70	4.12	4.57	4.39	4.62	5.14	5.49	6.10	Growth Rate: Standard Deviation:	5.79% .22

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-74

TOTAL NUMBER OF PERFORMANCES ($ Thousands)
15 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
By Full Orchestra	NA	747	684	752	822	800	823	874	921	778
By Ensemble	NA	639	562	1,027	1,268	1,866	2,049	2,566	1,599	1,949
Total	NA	1,386	1,246	1,779	2,090	2,666	2,872	3,440	2,520	2,727

Growth Rate: 11.36%
Standard Deviation: 1.21

Growth Rate calculated over 9 years.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-75

TOTAL ATTENDANCE - All PERFORMANCES (In Thousands)
15 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
By Full Orchestra	NA	1,463	1,287	1,414	1,556	1,506	1,630	1,730	1,977	1,632
By Ensemble	NA	122	161	223	242	306	416	457	424	394
Total	NA	1,585	1,448	1,637	1,798	1,812	2,046	2,187	2,401	2,026

Growth Rate: 5.49%
Standard Deviation: .46

Growth Rate calculated over 9 years.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-76

EARNED INCOME ($ Millions)
12 Metropolitan Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.64	.73	.74	.95	.93	1.07	1.29	1.41	1.60	1.78	Growth Rate: Standard Deviation:	12.12% .27
Dollars Deflated By Implicit GNP Deflator	.64	.70	.67	.83	.75	.78	.8[illegible]	.91	.97	.99	Growth Rate: Standard Deviation:	4.97% .26
Dollars Deflated By Consumer Price Index	.64	.70	.68	.84	.75	.78	.88	.91	.96	.98	Growth Rate: Standard Deviation:	4.76% .27

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-77

SUPPORT INCOME ($ Millions)
12 Metropolitan Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.08	1.32	1.43	1.57	1.72	1.85	2.19	2.30	2.52	3.12	Growth Rate: Standard Deviation:	11.18% .22
Dollars Deflated By Implicit GNP Deflator	1.08	1.26	1.30	1.37	1.39	1.35	1.49	1.49	1.53	1.75	Growth Rate: Standard Deviation:	4.09% .23
Dollars Deflated By Consumer Price Index	1.08	1.26	1.31	1.39	1.39	1.35	1.49	1.48	1.52	1.72	Growth Rate: Standard Deviation:	3.87% .24

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-78

TOTAL INCOME ($ Millions)
12 Metropolitan Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	1.73	2.06	2.17	2.53	2.65	2.92	3.48	3.71	4.12	4.90	Growth Rate: 11.52% Standard Deviation: .18
Dollars Deflated By Implicit GNP Deflator	1.73	1.95	1.97	2.19	2.13	2.13	2.37	2.40	2.51	2.74	Growth Rate: 4.41% Standard Deviation: .19
Dollars Deflated By Consumer Price Index	1.73	1.95	1.99	2.23	2.14	2.13	2.37	2.39	2.48	2.70	Growth Rate: 4.19% Standard Deviation: .21

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-79

TOTAL EXPENDITURES ($ Millions)
12 Metropolitan Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	1.80	1.98	2.14	2.37	2.60	3.02	3.55	3.57	4.03	4.70	Growth Rate: 11.20% Standard Deviation: .18
Dollars Deflated By Implicit GNP Deflator	1.80	1.88	1.95	2.06	2.10	2.20	2.42	2.31	2.46	2.63	Growth Rate: 4.11% Standard Deviation: .12
Dollars Deflated By Consumer Price Index	1.80	1.88	1.97	2.09	2.11	2.20	2.42	2.30	2.43	2.59	Growth Rate: 3.90% Standard Deviation: .13

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-80

DEFICIT (SURPLUS) FROM OPERATIONS ($ Thousands)
12 Metropolitan Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	76	(76)	(21)	(160)	(46)	97	72	(134)	(85)	(201)
Dollars Deflated By Implicit GNP Deflator	76	(72)	(19)	(139)	(37)	71	49	(87)	(52)	(112)
Dollars Deflated By Consumer Price Index	76	(72)	(19)	(141)	(37)	71	49	(86)	(51)	(111)

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-81

EARNINGS GAP ($ Millions)
12 Metropolitan Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.16	1.25	1.41	1.42	1.67	1.95	2.26	2.16	2.44	2.92	Growth Rate: Standard Deviation:	10.66 .28
Dollars Deflated By Implicit GNP Deflator	1.16	1.18	1.28	1.23	1.35	1.42	1.54	1.40	1.48	1.63	Growth Rate: Standard Deviation:	3.61 .21
Dollars Deflated By Consumer Price Index	1.16	1.18	1.29	1.25	1.35	1.42	1.54	1.39	1.47	1.61	Growth Rate: Standard Deviation:	3.39 .21

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE [illegible]82

EARNED INCOME ($ Millions)
29 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	3.69	3.95	4.28	5.04	6.26	6.42	7.33	9.05	10.61	12.15	Growth Rate: Standard Deviation:	14. 0.
Dollars Deflated By Implicit GNP Deflator	3.69	3.75	3.89	4.38	5.05	4.67	5.00	5.86	6.46	6.79	Growth Rate: Standard Deviation:	7. 0.
Dollars Deflated By Consumer Price Index	3.69	3.76	3.93	4.45	5.07	4.68	4.99	5.82	6.40	6.70	Growth Rate: Standard Deviation:	7. 0.

Data deflated using indices readjusted to FY 70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-83

SUPPORT INCOME ($ Millions)
29 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	5.89	6.26	6.82	7.37	9.62	9.58	10.41	11.28	13.78	16.62	Growth Rate: Standard Deviation:	11. 0.
Dollars Deflated By Implicit GNP Deflator	5.89	5.95	6.20	6.40	7.76	6.97	7.10	7.30	8.39	9.29	Growth Rate: Standard Deviation:	4. 0.
Dollars Deflated By Consumer Price Index	5.89	5.95	6.26	6.51	7.79	6.99	7.09	7.26	8.31	9.16	Growth Rate: Standard Deviation:	4. 0.

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-84

TOTAL INCOME ($ Millions)
29 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	9.51	10.20	11.10	12.41	15.89	16.00	17.75	20.32	24.39	28.76	Growth Rate: Standard Deviation:	12.9 0.2
Dollars Deflated By Implicit GNP Deflator	9.58	9.70	10.09	10.77	12.81	11.64	12.09	13.16	14.85	16.09	Growth Rate: Standard Deviation:	5.7 0.2
Dollars Deflated By Consumer Price Index	9.58	9.71	10.19	10.96	12.87	11.67	12.08	13.08	14.71	15.86	Growth Rate: Standard Deviation:	5.5 0.2

Data deflated using indices readjusted to FY 70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-85

TOTAL EXPENDITURES ($ Millions)
29 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	9.86	10.55	11.42	12.34	16.52	16.43	18.41	21.61	25.65	30.92	Growth Rate: Standard Deviation:	13.4 0.3
Dollars Deflated By Implicit GNP Deflator	9.86	10.04	10.38	10.71	13.31	11.95	12.55	14.00	15.62	17.29	Growth Rate: Standard Deviation:	6.2 0.3
Dollars Deflated By Consumer Price Index	9.86	10.05	10.48	10.90	13.38	11.98	12.54	13.91	15.47	17.05	Growth Rate: Standard Deviation:	6.0 0.3

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE [illegible]6

DEFICIT(SURPLUS) FROM OPERATIONS ($ Thousands)
29 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	279	354	319	(71)	632	428	668	1,284	1,264	2,161
Dollars Deflated By Implicit GNP Deflator	279	336	290	(62)	509	311	455	832	769	1,209
Dollars Deflated By Consumer Price Index	279	337	293	(63)	512	312	455	826	762	1,191

Data deflated using indices readjusted to FY 70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-87

EARNINGS GAP ($ Millions)
29 Regional Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	6.17	6.61	7.14	7.30	10.26	10.01	11.08	12.56	15.05	18.78	Growth Rate: Standard Deviation:	12.77% 0.43
Dollars Deflated By Implicit GNP Deflator	6.17	6.28	6.49	6.33	8.27	7.28	7.55	8.13	9.16	10.50	Growth Rate: Standard Deviation:	5.58% 0.38
Dollars Deflated By Consumer Price Index	6.17	6.29	6.55	6.45	8.31	7.30	7.55	8.08	9.08	10.35	Growth Rate: Standard Deviation:	5.36% 0.37

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE [illegible]8

EARNED INCOME ($ Millions)
83 Metropolitan Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	5.25	5.89	5.93	6.59	6.18	7.33	8.78	9.81	9.51	10.88	Growth Rate: Standard Deviation:	8.51% 0.35
Dollars Deflated By Implicit GNP Deflator	5.25	5.60	5.39	5.72	4.98	5.33	5.98	6.35	5.79	6.09	Growth Rate: Standard Deviation:	1.59% 0.30
Dollars Deflated By Consumer Price Index	5.25	5.60	5.44	5.82	5.00	5.34	5.98	6.31	5.74	6.00	Growth Rate: Standard Deviation:	1.38% 0.30

Data deflated using indices readjusted to FY 70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-89

SUPPORT INCOME ($ Millions)
83 Metropolitan Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	6.85	7.55	8.11	9.49	9.31	10.50	11.58	11.31	12.26	13.69	Growth Rate: Standard Deviation:	7.55% 0.21
Dollars Deflated By Implicit GNP Deflator	6.85	7.18	7.37	8.23	7.50	7.64	7.89	7.33	7.47	7.66	Growth Rate: Standard Deviation:	0.70% 0.24
Dollars Deflated By Consumer Price Index	6.85	7.18	7.45	8.38	7.54	7.66	7.89	7.28	7.40	7.55	Growth Rate: Standard Deviation:	0.49% 0.27

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE [illegible]0

TOTAL INCOME ($ Millions)
83 Metropolitan Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	12.09	13.44	14.04	16.08	15.49	17.83	20.36	21.12	21.78	24.58	Growth Rate: Standard Deviation:	7.97% 0.20
Dollars Deflated By Implicit GNP Deflator	12.09	12.77	12.75	13.95	12.48	12.97	13.88	13.68	13.26	13.74	Growth Rate: Standard Deviation:	1.09% 0.19
Dollars Deflated By Consumer Price Index	12.09	12.78	12.89	14.20	12.54	13.00	13.87	13.59	13.13	13.55	Growth Rate: Standard Deviation:	0.88% 0.21

Data deflated using indices readjusted to FY 70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-31

TOTAL EXPENDITURES ($ Millions)
83 Metropolitan Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	12.48	13.42	14.08	15.52	15.40	18.03	20.34	20.70	21.18	24.32	Growth Rate: Standard Deviation:	7.61% 0.20
Dollars Deflated By Implicit GNP Deflator	12.48	12.75	12.79	13.47	12.41	13.11	13.86	13.40	12.90	13.60	Growth Rate: Standard Deviation:	0.75% 0.15
Dollars Deflated By Consumer Price Index	12.48	12.77	12.92	13.71	12.47	13.14	13.85	13.32	12.78	13.41	Growth Rate: Standard Deviation:	0.54% 0.17

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE [illegible]2

DEFICIT (SURPLUS) FROM OPERATIONS ($ Thousands)
83 Metropolitan Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	387	(21)	42	(557)	(89)	196	(20)	(424)	(594)	(255)
Dollars Deflated By Implicit GNP Deflator	387	(20)	38	(483)	(72)	143	(14)	(275)	(362)	(143)
Dollars Deflated By Consumer Price Index	387	(20)	39	(492)	(72)	143	(14)	(273)	(358)	(141)

Data deflated using indices readjusted to FY 70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-93

EARNINGS GAP ($ Millions)
83 Metropolitan Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	7.23	7.53	8.15	8.93	9.22	10.70	11.56	10.89	11.67	13.44	Growth Rate: 6.9% Standard Deviation: 0.23
Dollars Deflated By Implicit GNP Deflator	7.23	7.16	7.41	7.75	7.43	7.78	7.88	7.05	7.11	7.52	Growth Rate: 0.09 Standard Deviation: 0.20
Dollars Deflated By Consumer Price Index	7.23	7.16	7.48	7.89	7.47	7.80	7.87	7.08	7.04	7.41	Growth Rate: (0.12 Standard Deviation: 0.22

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE [illegible]94

EARNED INCOME ($ Millions)
143 Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	37.74	40.60	43.53	47.16	50.22	58.76	67.18	75.42	87.22	101.23	Growth Rate: Standard Deviation:	11.66% 0.28
Dollars Deflated By Implicit GNP Deflator	37.74	38.58	39.55	40.91	40.48	42.73	45.78	48.85	53.09	56.62	Growth Rate: Standard Deviation:	4.54% 0.21
Dollars Deflated By Consumer Price Index	37.74	38.61	39.96	41.63	40.67	42.84	45.74	48.54	52.60	55.81	Growth Rate: Standard Deviation:	4.33% 0.19

Data deflated using indices readjusted to FY 70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-95

SUPPORT INCOME ($ Millions)
143 Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	41.71	48.98	51.64	57.66	66.22	69.94	75.35	81.54	92.96	110.93	Growth Rate: Standard Deviation:	10.47% 0.20
Dollars Deflated By Implicit GNP Deflator	41.71	46.55	46.91	50.02	53.37	50.86	51.35	52.81	56.59	62.04	Growth Rate: Standard Deviation:	3.43% 0.21
Dollars Deflated By Consumer Price Index	41.71	46.58	47.40	50.90	53.62	51.00	51.30	52.48	56.06	61.15	Growth Rate: Standard Deviation:	3.22% 0.23

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABL[illegible]96

TOTAL INCOME ($ Millions)
143 Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	79.45	89.57	95.17	104.81	116.44	128.70	142.53	156.96	180.18	212.15	Growth Rate: 11. Standard Deviation: 0.
Dollars Deflated By Implicit GNP Deflator	79.45	85.13	86.46	90.94	93.84	93.59	97.13	101.66	109.68	118.65	Growth Rate: 3. Standard Deviation: 0.
Dollars Deflated By Consumer Price Index	79.45	85.19	87.35	92.54	94.29	93.84	97.05	101.02	108.66	116.96	Growth Rate: 3. Standard Deviation: 0.

Data deflated using indices readjusted to FY 70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-97

TOTAL EXPENDITURES ($ Millions)
143 Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	82.79	92.28	98.01	107.19	119.37	133.49	147.18	163.79	184.91	216.32	Growth Rate: 10. Standard Deviation: 0.
Dollars Deflated By Implicit GNP Deflator	82.79	87.70	89.86	93.00	96.20	97.07	100.29	106.08	112.56	120.99	Growth Rate: 3. Standard Deviation: 0.
Dollars Deflated By Consumer Price Index	82.79	87.76	90.79	94.63	96.66	97.34	100.21	105.41	111.51	119.26	Growth Rate: 3. Standard Deviation: 0.

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABL[illegible]98

DEFICIT FROM OPERATIONS ($ Millions)
143 Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	3.34	2.71	3.75	2.38	2.93	4.79	4.65	6.83	4.73	4.17
Dollars Deflated By Implicit GNP Deflator	3.34	2.57	3.40	2.06	2.36	3.49	3.17	4.43	2.88	2.33
Dollars Deflated By Consumer Price Index	3.34	2.57	3.44	2.10	2.37	3.50	3.17	4.40	2.85	2.30

Data deflated using indices readjusted to FY 70 as the base.
Source of Data: American Symphony Orchestra League

TABLE 5-99

EARNINGS GAP ($ Millions)
143 Orchestras

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	45.05	51.68	55.38	60.04	69.14	74.74	80.00	88.37	97.69	115.10	Growth Rate: Standard Deviation:	10.3 0.1
Dollars Deflated By Implicit GNP Deflator	45.05	49.12	50.32	52.09	55.73	54.35	54.51	57.24	59.47	64.37	Growth Rate: Standard Deviation:	3.2 0.1
Dollars Deflated By Consumer Price Index	45.05	49.15	50.83	53.00	55.99	54.50	54.47	56.88	58.91	63.45	Growth Rate: Standard Deviation:	3.0 0.1

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

CHAPTER 6

OPERA

After symphony orchestras, opera, as a whole, is the oldest, most established form of performing art organizations. The Metropolitan Opera Company distinguishes itself by being the oldest (founded in 1883) and also the largest, as measured by budget size; indeed, it is a class by itself.

Figure 3-18 in Chapter 3 shows the founding years for 103 opera companies that were in continuous operation through 1977. About one-quarter of those organizations, mainly from the group with small budgets, began only in the decade of the seventies, while the early opera groups began in the thirties, almost half a century after the Met.

It should be noted that Figure 3-18 is somewhat misleading, there were opera organizations other than the Met existing at the turn of the century. It is only that those companies did not operate continuously until recently; indeed, many current operas were reorganized from the early companies.[1/]

Because of the relative age of this art form, one would expect relatively slow growth, especially for the Met.

THE SAMPLE AND THE DATA

The sample of opera companies for this study began with 29 organizations for which the Ford Foundation collected data until 1973-74. To this were added data that OPERA America began collecting in 1973-74. Two organizations were eliminated for lack of data after 1973-74. The size of the sample was further reduced because five more operas lacked a year or two of data. Because of the volatility of the opera data,[2/] the decision was made not to estimate or impute any gaps in the data. In

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[1/] The early operas operated successfully in the for-profit sector. After the change in tax laws, they followed the incentive to reorganize as non-profit organizations.

[2/] Unlike orchestras, the expenditures (the basic figure on which missing data was imputed) for individual operas were volatile--generally increasing over the decade but sometimes showing large decreases.

addition, at mid-decade, two operas—Spring and Western—merged. This left a sample of 21 organizations at the end of the decade.

Included in the sample is the Metropolitan Opera, which accounts for about half of the total expenditures of the entire sample, and therefore, has to be treated individually as had been done in previous (e.g., Ford Foundation) studies. Consequently, two sets of growth rates are presented for the entire sample of 21 organizations and for the group of 20 excluding the Met. As with the orchestras, the 20 operas are also stratified by budget size into two subgroups: the 3 larger operas and the 17 smaller ones. Hence, four groupings and sets of growth rates are presented. Figure 6-1 names the operas by class of budget size.

Unlike the symphony data, the opera data lack the wealth of variables available for the full decade. For the sample, we have financial data only, no operational data. And of the financial data, we have only the summary (total) variables. This lack of subsidiary data arises from inconsistency from year to year of the OPERA America data.3/ The details of the data problems are outlined in Appendix B.

GROWTH OF THE OPERA COMPANY SAMPLES

Figure 6-2 and Tables 6-15 and 6-16 present the earnings gap and its growth rate for the opera organization samples including and excluding the Met, respectively. It should be noted that for the opera data, earned income includes earnings from endowments and, hence, the earnings gap calculated is not a pure one which was calculated for the orchestras. However, since these earnings constitute only about 1 percent of earned income, it has no significant impact on the present analysis.

The earnings gap grew at a quicker and more steady pace for the rest of the sample than for the Met. The Met's earned income did not grow at all from 1972 to

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3/ For the 1980s this would not be a problem, since OPERA America's annual survey has been vastly improved over the last few years.

OPERAS IN THE SAMPLE

17 Smaller Operas

Baltimore Opera
Cincinnati Opera Association
Dallas Civic Opera
Florentine Opera of Milwaukee
Fort Worth Opera Association
Greater Miami Opera Association
Kentucky Opera Association
Lake George Opera Festival (Glens Falls, New York)
Minnesota Opera Company (St. Paul)
New Orleans Opera Association
Opera Memphis
Opera/Omaha
Pittsburgh Opera, Inc.
Portland Opera
San Diego Opera Association
Seattle Opera Association
Western Spring Opera (San Francisco)

3 Larger Operas

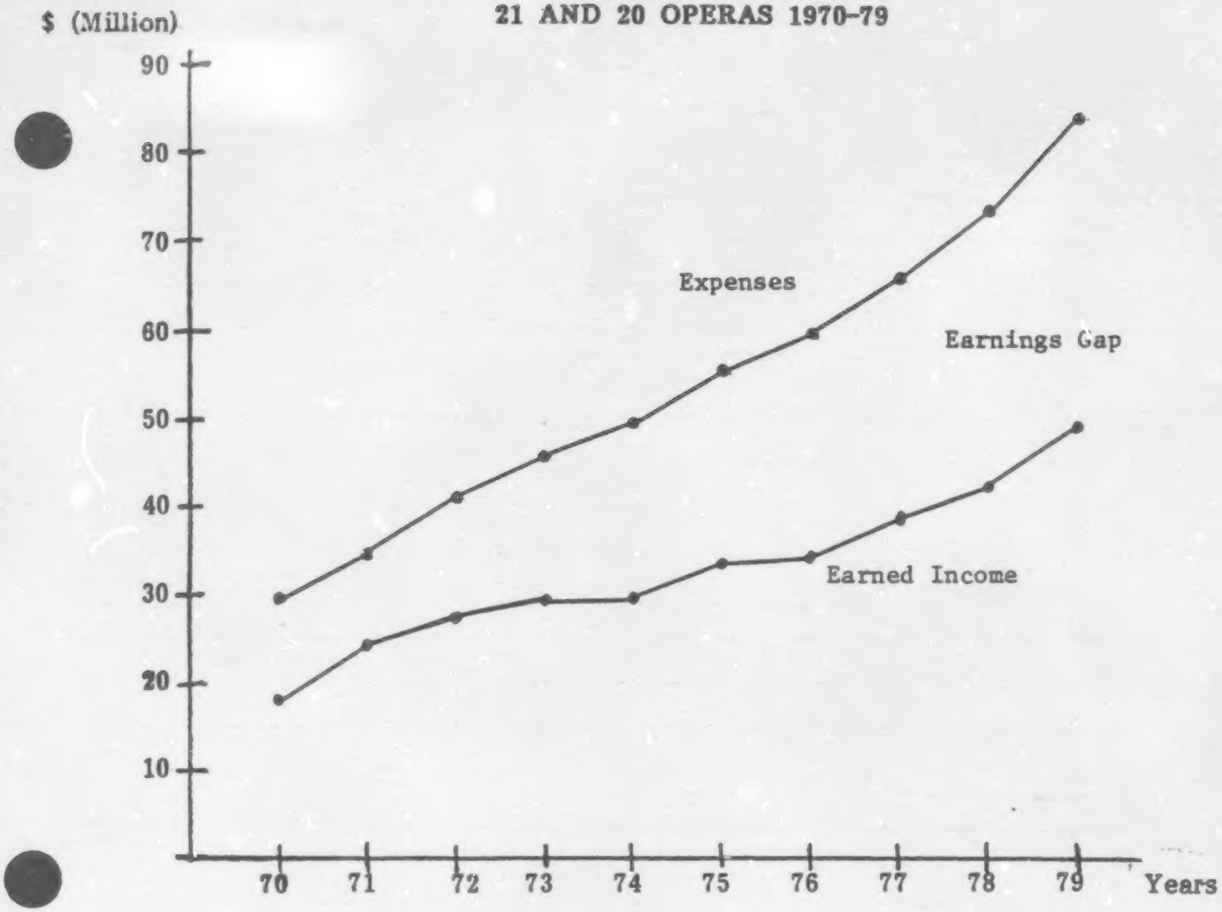
Lyric Opera of Chicago
San Francisco Opera
New York City Opera

The Largest Opera

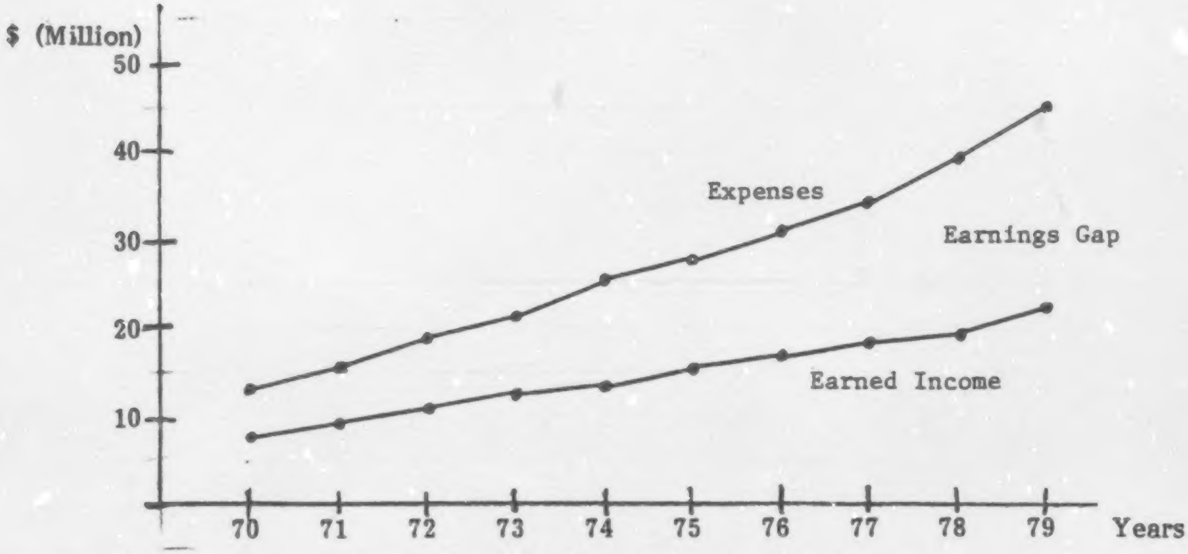
Metropolitan Opera Association

FIGURE 6-1

EARNINGS GAP
21 AND 20 OPERAS 1970-79



21 Operas (with the Met)



20 Operas (without the Met)

Source: The Ford Foundation and Opera America.
See Tables 6-1, 6-2, 6-11, 6-12, 6-15, and 6-16.

FIGURE 6-2

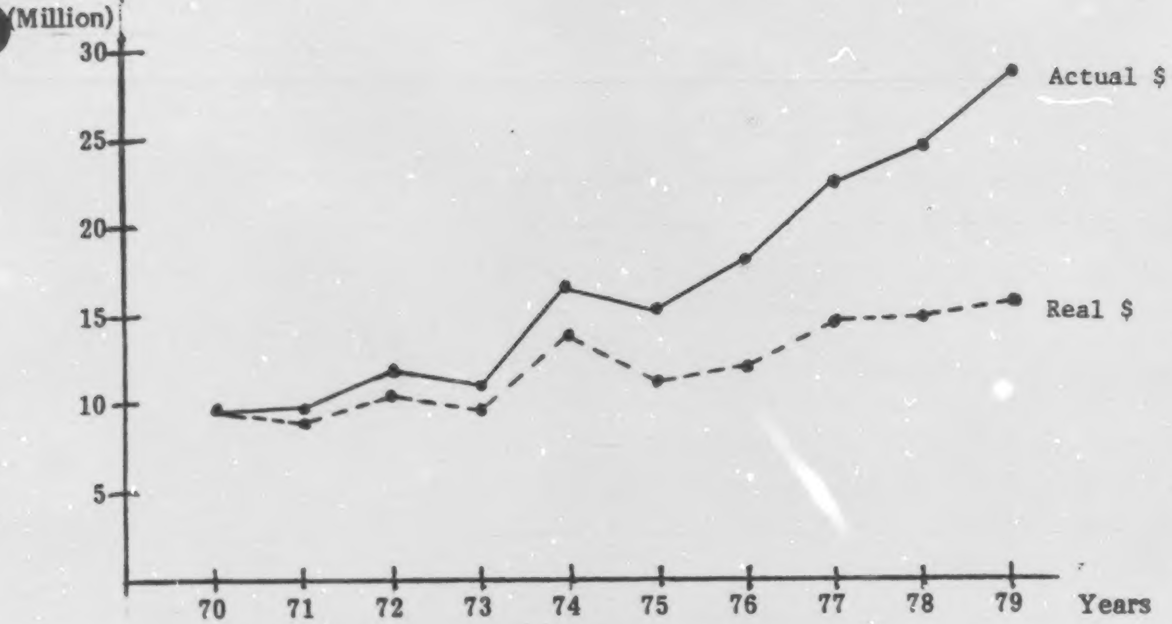
1974, but resumed growth after that. This created the widening earnings gap in the early part of the decade shown in Figure 6-2. The Met's lower rate of growth of the earnings gap (12.37 percent) lowers the full group of 21 operas and is in line with the hypothesis put forth in Chapter 4 that an older, more established organization—e.g., the Met--will exhibit a smaller growth of the earnings gap. In order to fully understand the growth of the earnings gap, one must look at its components of earned income and expenses.

Tables 6-1, 6-2, 6-11, and 6-12 explain why the earnings gap grew at a relatively large rate (in relation to orchestras)—not because earned income (Tables 6-1 and 6-2) grew slowly but rather as a result of the rapid growth of expenses (Tables 6-11 and 6-12), which outpaced earned income. Furthermore, the 21 Operas had a smaller growth rate for both earned income and expenses than did the 20 (the difference was greater for expenses) as a consequence of the slower growth of the Metropolitan Opera. This oldest, well-established opera could not expand output greatly, and with its house already at almost full capacity, it could not increase earned income significantly. Indeed, the Met's earned income in constant dollars grew at less than 1 percent. On the other hand, as will be seen later when the sample is further partitioned, some of the other aspiring operas expanded both their expenses and their earned income at a very quick pace. But what allowed expenses to grow more quickly than earned income, producing an increasing earnings gap?

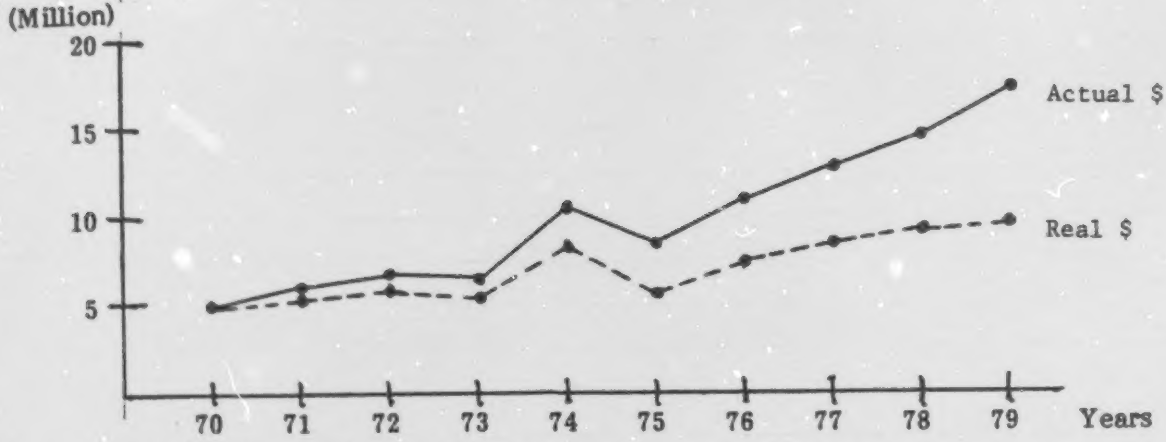
Tables 6-7 and 6-8 show that total support income (which, if possible, should fill or exceed the earnings gap) grew at a rate much larger than that of the orchestras. This was the result of both a large rise in private contributions (Tables 6-3 and 6-4 and Figure 6-3) and an even larger rise in government support (Tables 6-5 and 6-6 and Figure 6-4). The 21 Operas showed a somewhat quicker growth of government support than the 20, due to the Met's tenfold increase in government support. This seems to represent a phenomenal increase until one realizes that the amount of government support for the Met was only 1.3 percent of total income in 1970 and 4.9 percent in 1979.

Figure 6-3 shows that private support grew slowly during the first half of the decade and faster during the second half. Government support, on the other hand,

PRIVATE SUPPORT
21 AND 20 OPERAS: 1970-79



21 OPERAS (with the Met)



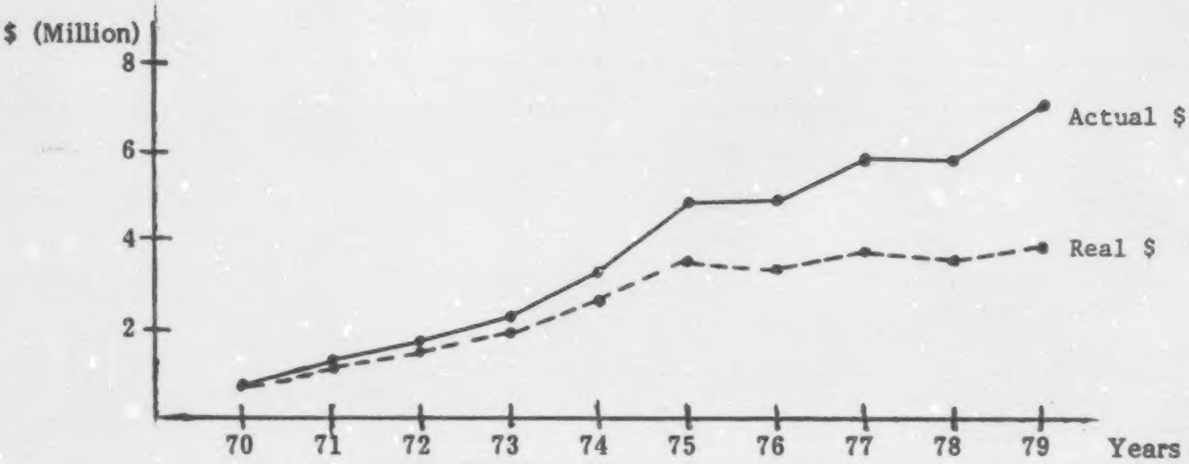
20 OPERAS (without the Met)

Data deflated using CPI readjusted to FY70 as the base.

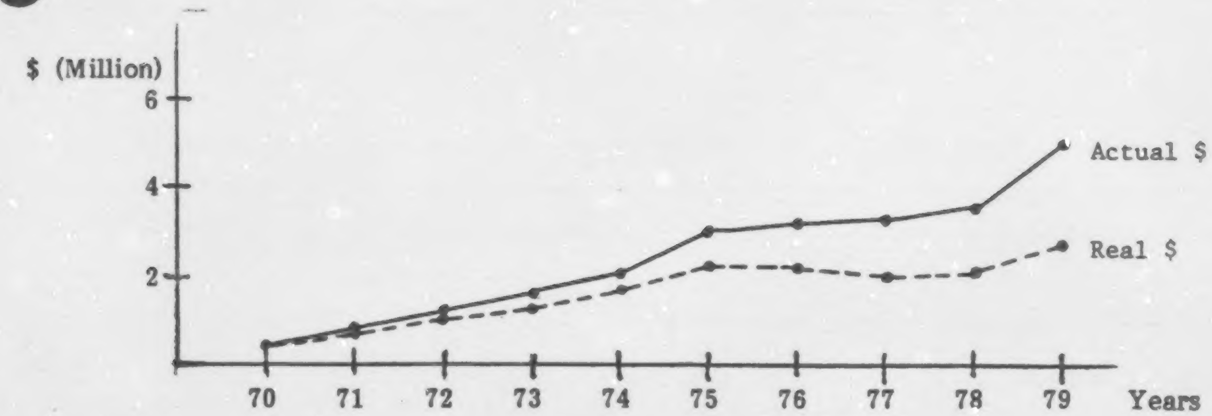
Source: The Ford Foundation and Opera America
See Tables 6-3 and 6-4.

FIGURE 6-3

GOVERNMENT SUPPORT
21 AND 20 OPERAS: 1970-79



21 OPERAS (with the Met)



20 OPERAS (without the Met)

Data deflated using CPI readjusted to FY70 as the base.

Source: The Ford Foundation and Opera America
See Tables 6-5 and 6-6.

FIGURE 6-4

acted in the reverse, growing quickly in the first half of the decade and very slowly in the second half (with the exception of the last year). In constant dollars, government support was nearly level during the second half of the decade while private support continued to grow. The one-year increase in private support in 1974 was the result of large increases to three organizations--increased giving from individuals and fundraising events to the Met, increased business giving to the Lyric Opera of Chicago, and increased foundation giving to the New York City Opera. The reader is cautioned against too close examination of the data, since Ford Foundation data are used through 1974 and OPERA America data begin in 1975, and this curve may reflect in part some undiscovered reporting difference.

Let us now turn to the surplus/(deficit). Using the data from Tables 6-13 and 6-14, one finds that while the 21 Operas accumulated a total deficit of more than $6 million over the decade, the 20 showed a slight surplus of almost $1 million. (An accumulated surplus/(deficit) is the sum of all the surpluses and deficits over the period.) The difference between the two groups was due to the Met, which showed a deficit for every year except the last three. Thus, the Met--with a large endowment corpus--followed a path similar to that of the 17 major orchestras, while the other operas--with small or no endowments--appeared to be aiming for a zero-deficit level. Tables 6-9 and 6-10 give total income, which grew at rates similar to but not exactly that of expenditures. The ups and downs reflected by the surplus/(deficit)s shown in Tables 6-13 and 6-14 are in large part caused by the fluctuations in opera production costs. Operas are relatively very expensive to produce, so unlike the other performing arts that can gradually increase their budget size with an increase in output, opera company expenditures tend to go up and down with dramatic jumps.

The patterns of support income and budget balancing were affected by two new programs designed to focus on a long-term solution by lifting the organizations to a new level of financial stability. One of them, the NEA Challenge Grant Program, is described in Chapter 5 on orchestras. Eight of the opera companies in this study's sample, including all of the four larger operas, received such grants during the last years of the decade. This was the source of the upturn in government support at the end of the decade and, as was the case with the orchestras, it was partly responsible for the cut in deficits, especially the FY79 surplus for all budget groups. The other program that affected the financial stability of the operas came from the private sector. The Ford Foundation Cash Reserve Program was developed in 1971 to stabilize and improve the financial position of theater, opera and dance companies.[4]

The program had four goals:

(1) To eliminate cash-flow crises by providing a working capital reserve

(2) To reduce costly debt-service payments

(3) To provide companies with an incentive to complete each fiscal year in a net current asset position

(4) To underscore the need for sound management practices and effective multi-year planning.

In order to achieve these goals, the program had two parts. First, money was provided for the liquidation of half of a company's net current liabilities after the company had liquidated the other half within a prescribed period of time. Thereafter, the company had to complete each fiscal year throughout the period of the grant in a net current asset position. Second, money was provided in installments for a restricted revolving cash fund from which withdrawals could be made to meet operating expenses until earned income and contributed funds came in. In order to receive the next installment of the cash reserve grant, the company had to restore all withdrawals from the revolving fund before the close of each fiscal year. If this was done over the entire period of the grant, generally five years, the company kept the revolving fund as an unrestricted working capital reserve.

Throughout the grant period, the Ford Foundation also provided technical assistance in accounting procedures, controls, and internal financial reporting.

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[4] The following discussion is based on the Ford Foundation: Theater Reawakening: A Report on Ford Foundation Assistance to American Drama. New York, 1977. p. 12.

According to data received from the Ford Foundation,[5] the 20 Operas received $6.5 million in cash reserve grants; $3.8 million of this amount went to the three largest operas in this group. However, the lack of detailed data for opera companies, especially for non-operating funds, precludes the tracking of the disposition of funds received from the Ford Foundation. But the overall impact as observed from the limited data--especially regarding the surplus/(deficit)--appears to support the following statement by a veteran observer of the opera field.[6]

> ...high-interest loans and deferred deficits...used to be a generally accepted practice but was almost totally eliminated during the second half of the seventies, following the successful four-year Ford Foundation grant program addressing the specific problems of cash reserve and accumulated operating deficits... Since then, we have witnessed much greater financial stability among large opera companies.

The NEA Challenge Grants at the end of the decade provided an additional push in the same direction. It should be noted that both these grants and the Ford Foundation grants were not of a continuous nature, but rather attempted to influence the long-run financial stability of the opera companies. This raises the same question posed for similar grant problems for symphony orchestras: What will indeed be the long-term effects of these programs? Only the test of time will settle this question.

STRATIFICATION BY BUDGET SIZE

As was done with orchestras, the 20 opera companies were stratified by budget size. One group consists of the three larger operas that started the decade with more than $2 million in expenses each and had more than $7 million of expenses each in 1978-79--San Francisco Opera, Lyric Opera of Chicago, and New York City Opera.

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[5] News from the Ford Foundation, October 18, 1971. Additional figures supplied by Richard Sheldon, then at the Ford Foundation.

[6] Rich, Maria F. Trials and Triumphs: U.S. Opera Survey 1979-80.

The remaining 17 smaller ones are listed on Figure 6-1. Their expenses in 1969-70 were each under $1 million and in 1978-79 ranged from $337,000 to $2.6 million.

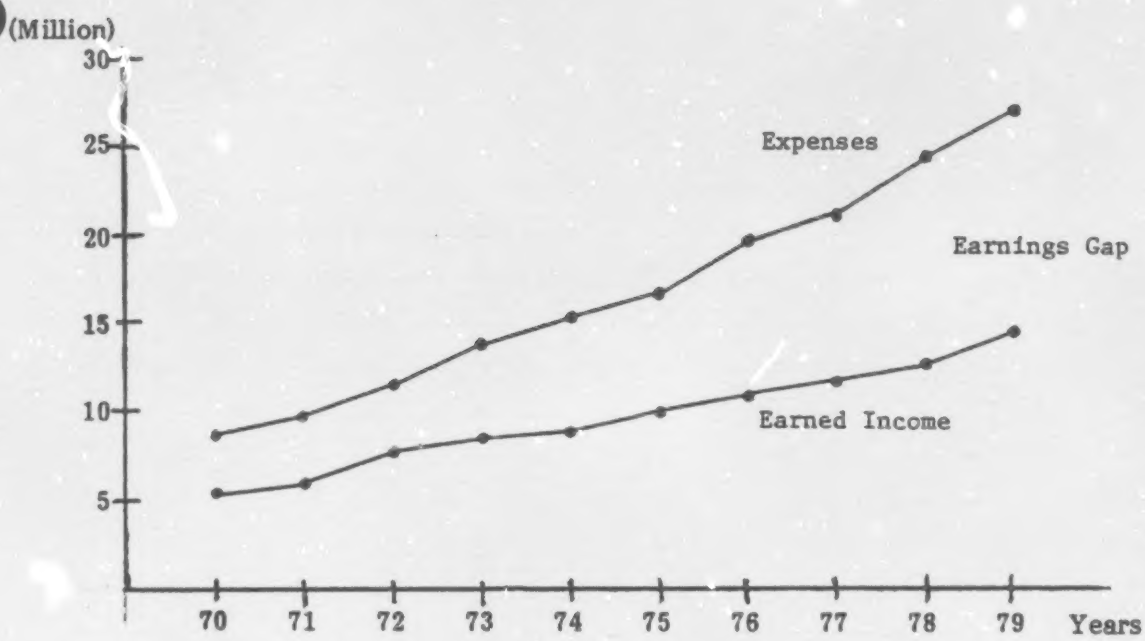
Tables 6-17 through 6-32 present the growth of the same variables as in Tables 6-1 through 6-16, but for the group of 3 Operas and of 17 Operas. The data show that the three larger operas had a slower growth of earned income and expenses but that the difference in the former was greater. The earned income of the larger operas grew at 10.9 pecent, but for the smaller 17 operas, earned income grew at 13.5 percent. With expenses growing at 13.7 and 14.6 percent, respectively, the resulting growth in earnings gap for the two groups differs, with the three larger operas producing a greater rate of growth. (See Figure 6-5.)

At the same time, the three Operas had a much larger rate of growth in both private and government support, which funded the growing gap. (See Figures 6-6 and 6-7.) The trend of private support for the 20 Operas (Figure 6-3) is basically the same when split apart for the 3 larger and 17 smaller operas (Figure 6-6). There was slower growth in the first half of the decade and faster growth in the second half. For the three larger operas, private support in real terms almost tripled, growing at a rate of almost 10 percent. The 17 smaller operas showed a small growth in real terms; a rate of about 2.5 percent, almost all of which came in the first few years.

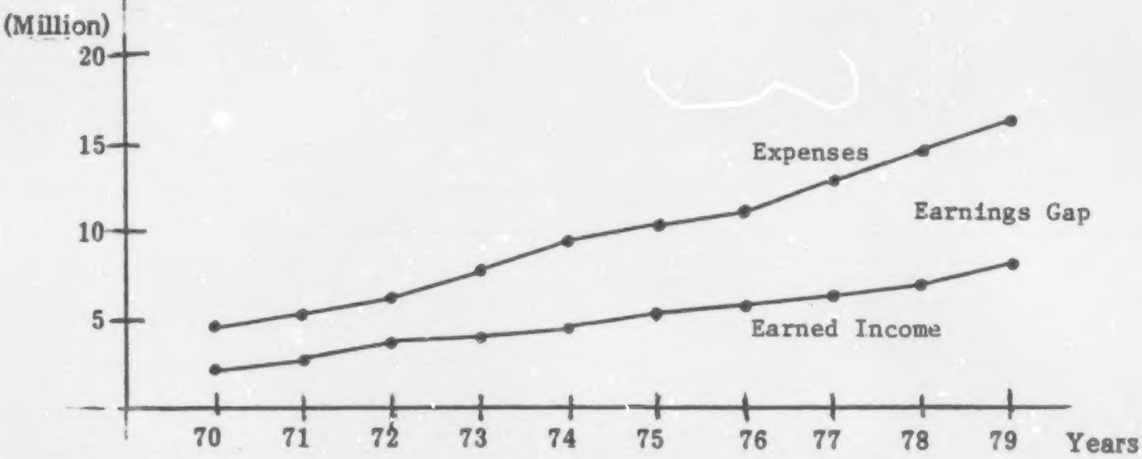
Government support (Figure 6-7) grew quickly in the first half of the decade for both the 3 and the 17, leveled off, and showed another increase at the end of the decade. Although the increase was tenfold, the absolute amount of government support in 1979 was still small--8.4 percent of total income for the 3 larger operas and 15.9 percent of total income for the 17 smaller organizations. Private support maintained a much larger share: 39.3 percent of total income for the 3 larger operas and 37.2 percent for the 17 smaller.

At the beginning of the decade, the group of 3 and the group of 17 were providing 63.9 and 50.9 percent, respectively, of their total income through earned income. But as the earnings gap grew, earned income fell to 52.2 and 46.9 percent, respectively, of total income in 1979. Both private and government support made up

EARNINGS GAP
3 Larger and 17 Smaller Operas: 1970-79



3 Larger Operas

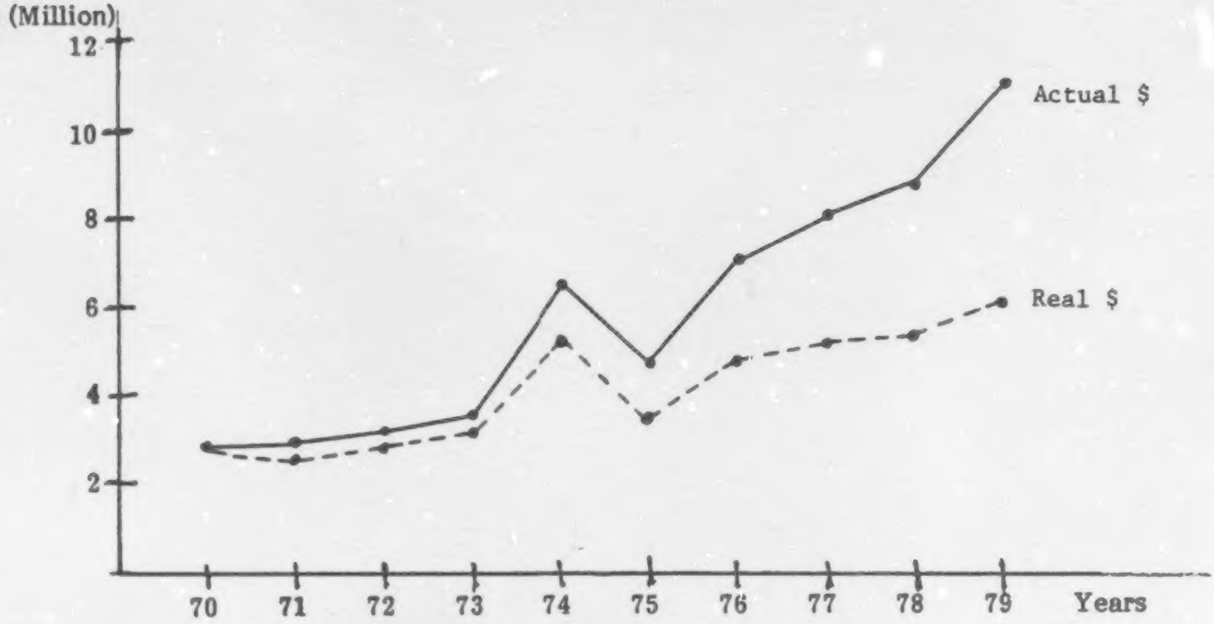


17 Smaller Operas

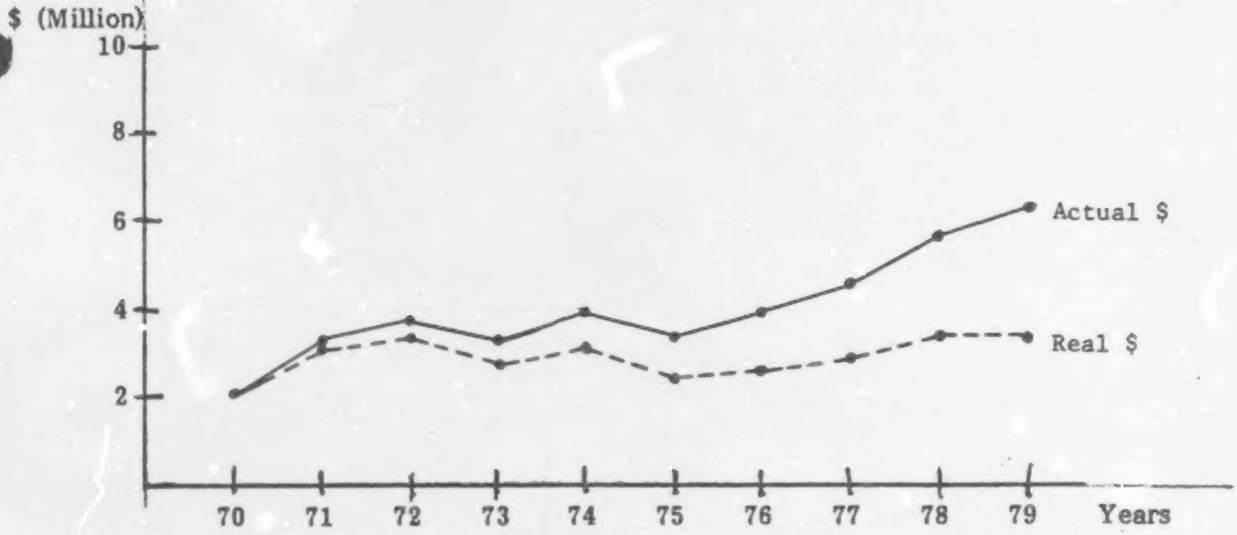
Source: The Ford Foundation and Opera America
See Tables 6-17, 6-18, 6-27, 6-28, 6-31, and 6-32.

FIGURE 6-5

PRIVATE SUPPORT
3 Larger and 17 Smaller Operas: 1970-79



3 Larger Operas



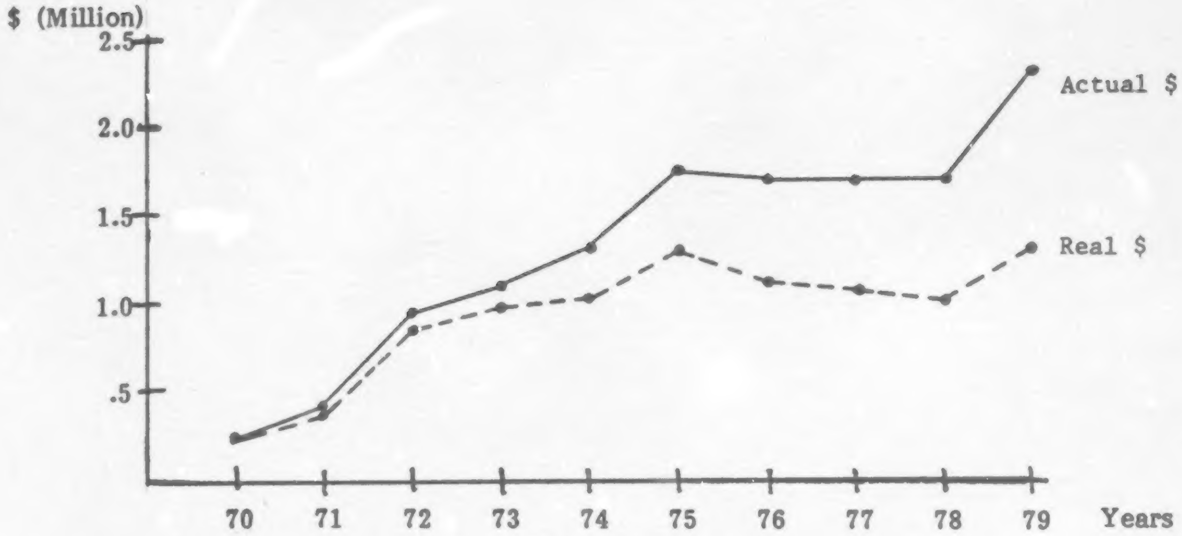
17 Smaller Operas

Data deflated using CPI readjusted to FY70 as the base.

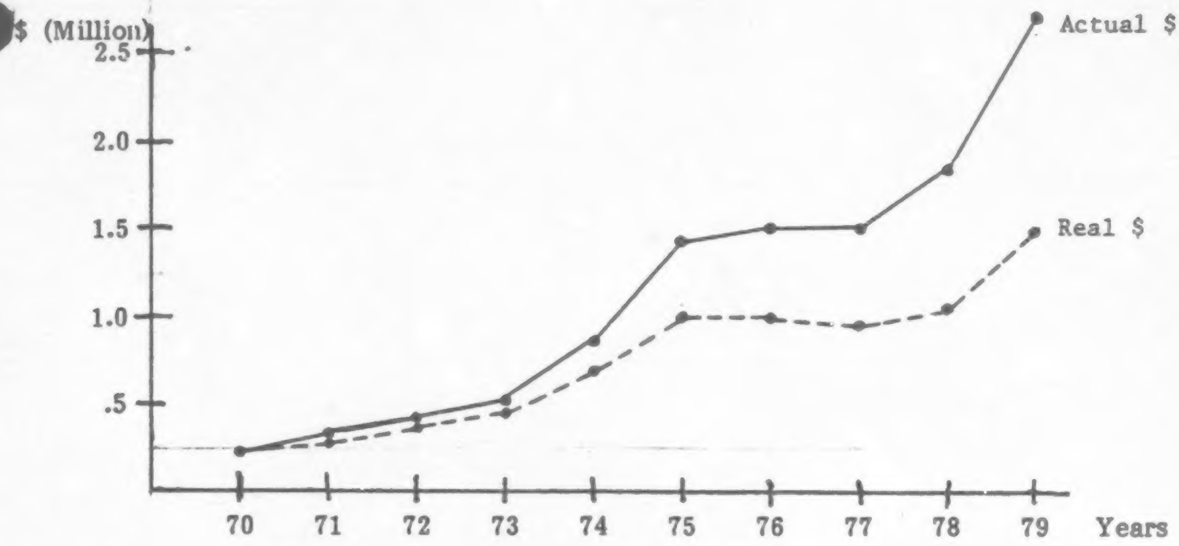
Source: The Ford Foundation and Opera America
See Tables 6-19 and 6-20.

FIGURE 6-6

GOVERNMENT SUPPORT
3 Larger and 17 Smaller Operas: 1970-79



3 Larger Operas



17 Smaller Operas

Data deflated using CPI readjusted to FY70 as the base.

Source: The Ford Foundation and Opera America
See Tables 6-21 and 6-22.

FIGURE 6-7

the difference, but the support income was not quite enough. Figure 6-8 and the data on Table 6-29 show that over the decade, the larger operas had six surplus and four deficit years, accumulating a deficit over the decade of $0.6 million. The smaller operas had five surplus and five deficit years (Figure 6-8 and Table 6-30), but accumulated a surplus of more than $1.5 million over the decade. It is interesting to note that while the larger operas had alternating surpluses and deficits over the period, the smaller operas had surpluses in the first half of the decade and deficits in the second half. However, both groups ended the decade showing a surplus. The Met also had a surplus in 1978-79, but for the total sample of 21 operas (including the Met), the total surplus for that year was only $885,000.

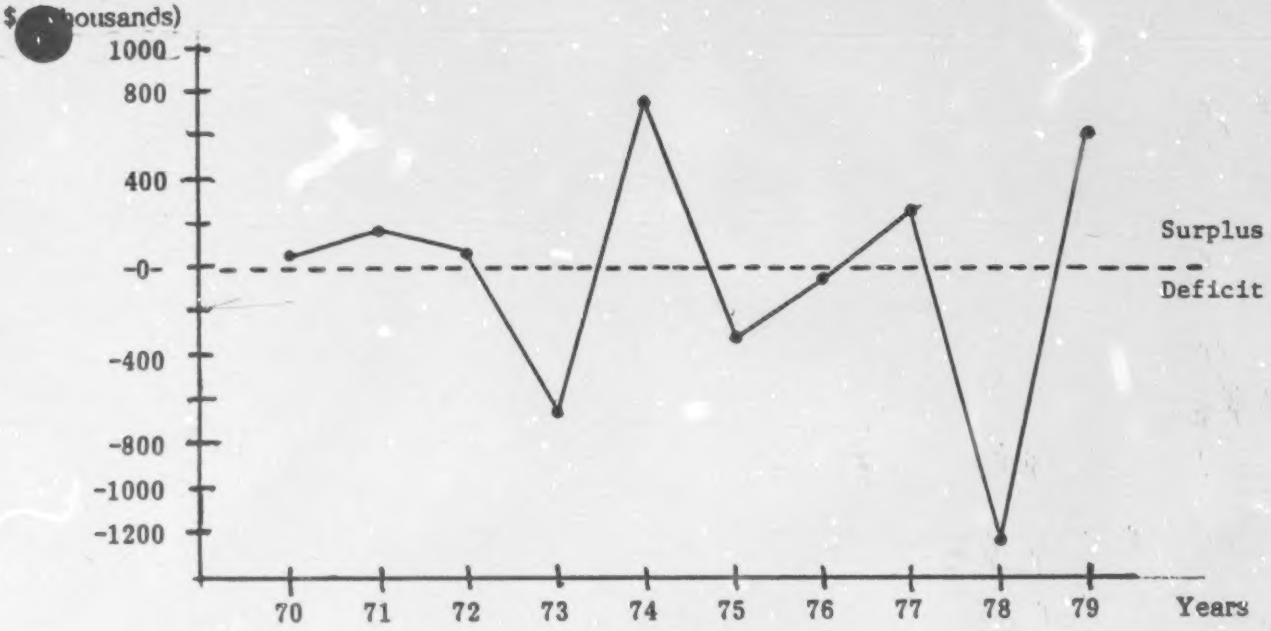
GROWTH OF THE OPERA UNIVERSE

So far, this chapter has detailed the growth of the sample of 21 major operas. Two questions arise: (1) What part of the universe of opera companies does the sample represent, and (2) what can be inferred from the sample about the universe?

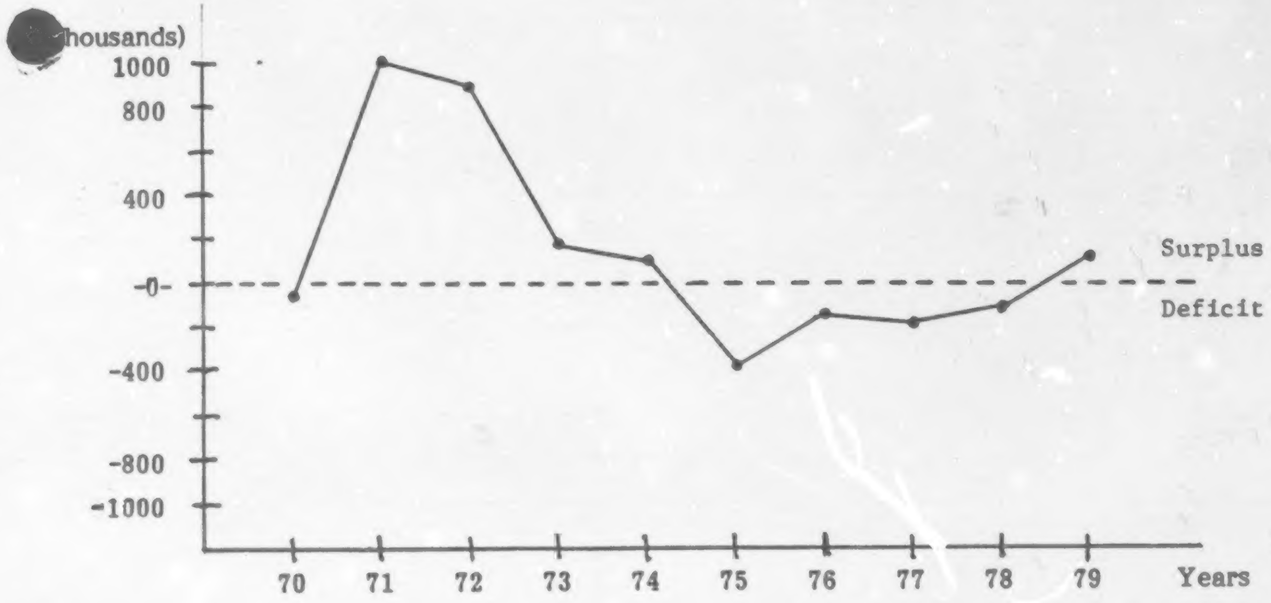
In order to get some measure of the universe, data gathered by the Central Opera Service (COS) under the direction of Maria Rich was used. The top portion of Figure 6-9 presents data on the COS opera universe for the first year and the last half of the decade. The bottom half of the Figure presents a comparable breakup of our sample data.

It is clear from Figure 6-9 that at the end of the period, the 70s decade sample represented about three-quarters of the total budget of all companies with budgets over $100,000 and more than 57 percent of the total budget of the entire universe. Further back in the decade, it represented an ever-increasing proportion of both groups. Furthermore, if we compare a breakdown of the sample with a breakdown of the universe (Figure 6-10), we see that the higher the budget group, the better it is represented in the sample. One other important fact to note is that the COS universe is made up of opera-producing organizations. If organizations that are not primarily opera companies (Figure 6-11) are eliminated, the COS universe is reduced to 355 opera companies in 1978-79 with a total budget in the range of $116.2 million to

SURPLUS/(DEFICIT)
3 Larger and 17 Smaller Operas 1970-79



3 Larger Operas



17 Smaller Operas

Source: The Ford Foundation and Opera America
See Tables 6-29 and 6-30.

FIGURE 6-8

THE OPERA UNIVERSE AND OUR SAMPLE

	The Central Opera Service Universe				
	FY70	FY75	FY77	FY78	FY79
Numbers of Performing Groups					
Companies Over $100,000 Budget	35	54	68	78	95
Companies Between $25,000 and $99,999 Budget	NA	NA	NA	NA	73
Orchestra, Festival, Chorus, Avocational, Club, Nonprofit Theater, etc.	NA	NA	NA	NA	383
Subtotal	266	335	424	458	456
College/University Workshops	347	418	422	420	415
TOTAL	648	807	914	956	966
Expenses (in $Millions)					
Companies Over $100,000 Budget	$36.5	NA	$ 79.7	$ 96.3	$111.5
Companies Between $25,000 and $99,999	NA	NA	3.5	4.4	3.8
All Others	NA	NA	27.2	29.8	31.1
TOTAL			$110.4	$130.5	$146.4

	The 70s Decade Sample				
	FY70	FY75	FY77	FY78	FY79
Numbers of Performing Groups					
Companies Over $100,000 Budget	19	21	21	21	21
Companies Between $25,000 and $99,999	2	0	0	0	0
TOTAL	21	21	21	21	21
Expenses (in $Millions)					
All 21 Companies	$29.4	$55.2	$65.5	$73.6	$84.1

FIGURE 6-9

BREAKDOWN BY BUDGET GROUPS

1978-1979

Budget Size	Sample	COS Universe
Over $1 Million	10	15
Between $500,000 and $999,999	5	15
Between $200,000 and $499,999	6	29
Between $100,000 and $199,999	0	36
	21	95

FIGURE 6-10

OPERA COMPANIES AND OTHER ORGANIZATIONS PRODUCING OPERA

1978-1979

	Opera Companies	Other Organizations Producing Opera	TOTAL
COS Universe, 1978-1979			
Companies Over $100,000	95	--	95
Companies Between $25,000 and $99,999	73	--	73
Subtotal: Serious/Professional	168	--	168
Orchestra/Festival/Chorus	--	125	125
Theater (Nonprofit)	--	71	71
Avocational/Club, etc.	187	--	187
College/University Workshop	--	415	415
TOTAL	355	611	966

Expenses: Opera Companies ($ Millions)			
95 Companies over $100,000	$111.5		
73 Companies Between $25,000 and $99,999	3.8		
Subtotal: Serious/Professional	115.3		
187 Avocational/Clubs, etc.			
Range { 5,000 Average	.94		
Range { 20,000 Average	3.74		
Total for Opera Companies	$116.2	to	$119.0
Expenses: 70s Decade Sample of 21 Opera Companies ($ Millions)			
21 Companies	$84.12		
Percentage of COS Universe of Opera Companies	72.4% - 70.7%		

FIGURE 6-11

$119.0 million. (We did not have total expenditures for the avocational/clubs group, so we calculated a range using an average budget size of $5,000 for the low and $20,000 for the high in this group.)[7] Our sample of 21 operas had a total budget of $84 million, or 72.4 to 70.7 percent of the COS universe.

If the growth of the COS universe shown on Figure 6-9 is examined, an interesting factor appears. Until 1976-77, the increase in expenses was somewhat greater for the sample ($29.4-$65.5 million) than for all the over $100,000 companies ($36.5-79.7 million), but after that, the reverse was true ($65.5-84.1 million for the sample and $79.7-$111.5 million for the COS over $100,000 group). This was due, in great part, to the huge increase in the number of companies in the COS group, while the number of companies in the sample remained fixed. The COS group were not only companies that grew as a result of inflation or even an increase in real expenditures, but also new companies.[8] We can assume that some of the companies are new because the total number of companies almost doubled over the decade.

GROWTH OF OTHER VARIABLES

Since data on non-financial variables were not available for individual opera companies, the growth of other variables in the opera universe are examined from data reported by the Central Opera Service. Several conclusions appear from Figure 6-12.

(1) The number of performances increased much more than the number of different operas performed. Economies of scale result from more performances from the same rehearsals and with the same sets and costumes.

(2) The size of audiences more than double over the decade even though the number of performances was up only slightly more than 75 percent.

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[7] Opera companies above $25,000 budget fall into the group of 73 companies on which were reported expenses of $3.8 million. Therefore, we chose the high average budget size at $20,000.

[8] We do not have the relevant data on founding dates, which would provide concrete information on this point.

PERFORMANCES, PRODUCTIONS, REPERTOIRE, AUDIENCES
THE COS UNIVERSE OF OPERA

Number of Performances	79-80	78-79	77-78	76-77	74-75	69-70
Standard repertoire	5,482	5,181	5,191	4,574	4,097	3,011
Comtemporary foreign repertoire	548	609	523	622	2,331	1,768
Contemporary American repertoire	3,361	2,764	2,092	2,193	na	na
Total	9,391	8,554	7,806	7,389	6,428	4,779
Musicals (not included in total)	1,397 (10,788)	1,430 (9,984)	906 (8,712)	217 (7,606)	na na	na na
Number of Operas Performed						
Standard	237	242	237	226	209	178
Contemporary (foreign)	47	54	55	44	71	163
Contemporary (American)	213	202	156	157	107	na
Total	497	498	448	427	387	341
[illegible]icals (not included in total)	104	72	43	34	na	na
World Premieres	79	64	42	33	16	17
American Premieres	22	18	21	14	11	18
Audiences (in millions)	10.7	9.94	9.76	9.20	8.00	4.60

Source: Rich, Maria. "Central Opera Service Annual Survey Statistics." Central Opera Service Bulletin 22(3):32, Fall 1980.

FIGURE 6-12

(3) There was a shift toward contemporary American operas. Throughout the latter half of the decade represented by the COS data, a project grant priority (or funding category) of the National Endowment for the Arts was to encourage the presentation of a varied repertory, especially contemporary American works. This perhaps explains the growth in presentation of American works, although without greater detail in the data, no specific correlations can be observed.

TABLE 6-1

EARNED INCOME* ($ Millions)
21 Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	18.06	24.74	27.31	28.64	29.80	33.59	34.20	37.48	42.22	49.15	Growth Rate: Standard Deviation:	9.51% 0.39
Dollars Deflated By Implicit Price Deflator	18.06	23.51	24.81	24.84	24.01	24.42	23.30	24.27	25.70	27.49	Growth Rate: Standard Deviation:	2.53% 0.41
Dollars Deflated By Consumer Price Index	18.06	23.53	25.07	25.28	24.13	24.49	23.28	24.12	25.46	27.09	Growth Rate: Standard Deviation:	2.32% 0.43

*Data includes endowment earnings.

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-2

EARNED INCOME* ($ Millions)
20 Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	7.94	9.31	11.22	12.36	13.35	15.33	17.00	18.55	19.91	22.73	Growth Rate: Standard Deviation:	11.79% 0.22
Dollars Deflated By Implicit Price Deflator	7.94	8.84	10.[illegible]	10.73	10.76	11.15	11.59	12.01	12.12	12.71	Growth Rate: Standard Deviation:	4.67% 0.27
Dollars Deflated By Consumer Price Index	7.94	8.85	10.30	10.91	10.81	11.18	11.58	11.94	12.01	12.53	Growth Rate: Standard Deviation:	4.45% 0.30

*Data includes endowment earnings.

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-3

PRIVATE SUPPORT ($ Millions)
21 Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	9.29	9.72	11.64	11.18	16.92	15.60	17.99	22.77	24.66	28.81	Growth Rate: 13.85 Standard Deviation: 0.46
Dollars Deflated By Implicit Price Deflator	9.29	9.24	10.57	9.70	13.64	11.34	12.26	14.75	15.01	16.11	Growth Rate: 6.59 Standard Deviation: 0.43
Dollars Deflated By Consumer Price Index	9.29	9.24	10.68	9.87	13.70	11.37	12.25	14.65	14.87	15.88	Growth Rate: 6.37 Standard Deviation: 0.42

Data deflated using incides readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-4

PRIVATE SUPPORT ($ Millions)
20 Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	5.01	6.20	6.99	6.86	10.42	8.28	11.01	12.69	14.56	17.43	Growth Rate: 13.82 Standard Deviation: 0.56
Dollars Deflated By Implicit Price Deflator	5.01	5.89	6.35	5.95	8.40	6.02	7.50	8.22	8.86	9.75	Growth Rate: 6.57 Standard Deviation: 0.55
Dollars Deflated By Consumer Price Index	5.01	5.89	6.41	6.06	8.44	6.04	7.50	8.17	8.78	9.61	Growth Rate: 6.35 Standard Deviation: 0.55

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-5

GOVERNMENT SUPPORT ($ Millions)
21 Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	0.65	1.30	1.79	2.33	3.31	4.90	4.93	5.95	5.94	7.05	Growth Rate: Standard Deviation:	28.06% 1.53
Dollars Deflated By Implicit Price Deflator	0.65	1.23	1.63	2.02	2.67	3.56	3.36	3.86	3.62	3.95	Growth Rate: Standard Deviation:	19.90% 1.48
Dollars Deflated By Consumer Price Index	0.65	1.23	1.64	2.05	2.68	3.57	3.36	3.83	3.58	3.89	Growth Rate: Standard Deviation:	19.65% 1.51

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-6

GOVERNMENT SUPPORT ($ Millions)
20 Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	0.46	0.78	1.34	1.67	2.17	3.16	3.20	3.21	3.55	5.08	Growth Rate: Standard Deviation:	26.66% 1.53
Dollars Deflated By Implicit Price Deflator	0.46	0.74	1.21	1.45	1.75	2.29	2.18	2.08	2.16	2.84	Growth Rate: Standard Deviation:	18.59% 1.48
Dollars Deflated By Consumer Price Index	0.46	0.74	1.23	1.47	1.76	2.30	2.18	2.07	2.14	2.80	Growth Rate: Standard Deviation:	18.35% 1.51

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-7

SUPPORT INCOME ($ Millions)

21 Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
ctual ollars	9.94	11.02	13.43	13.50	20.23	20.49	22.92	28.72	30.61	35.86	Growth Rate: Standard Deviation:	15.73% 0.39
ollars Deflated By nplicit Price Deflator	9.94	10.47	12.20	11.72	16.30	14.90	15.62	18.60	18.63	20.06	Growth Rate: Standard Deviation:	8.35% 0.38
ollars Deflated By onsumer Price Index	9.94	10.48	12.32	11.92	16.38	14.94	15.60	18.48	18.46	19.77	Growth Rate: Standard Deviation:	8.13% 0.38

ata deflated using indices readjusted to FY70 as the base.
ource of Data: The Ford Foundation and Opera America

TABLE 6-8

SUPPORT INCOME ($ Millions)

20 Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
ctual ollars	5.47	6.98	8.32	8.53	12.59	11.44	14.21	15.90	18.11	22.51	Growth Rate: Standard Deviation:	15.71% 0.45
ollars Deflated By nplicit Price Deflator	5.47	6.63	7.56	7.40	10.15	8.32	9.68	10.30	11.03	12.59	Growth Rate: Standard Deviation:	8.34% 0.46
ollars Deflated By onsumer Price Index	5.47	6.63	7.64	7.53	10.20	8.34	9.67	10.23	10.92	12.41	Growth Rate: Standard Deviation:	8.11% 0.47

ata deflated using indices readjusted to FY70 as the base.
ource of Data: The Ford Foundation and Opera America

TABLE 6-9

TOTAL INCOME ($ Millions)
21 Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	28.00	35.76	40.74	42.14	50.03	54.08	57.11	66.20	72.83	85.01	Growth Rate: 11.79% Standard Deviation: 0.26
Dollars Deflated By Implicit Price Deflator	28.00	33.98	37.01	36.56	40.32	39.33	38.92	42.88	44.34	47.54	Growth Rate: 4.67% Standard Deviation: 0.30
Dollars Deflated By Consumer Price Index	28.00	34.01	37.39	37.20	40.51	39.43	38.89	42.61	43.92	46.86	Growth Rate: 4.45% Standard Deviation: 0.32

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-10

TOTAL INCOME ($ Millions)
20 Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	13.41	16.28	19.55	20.89	25.94	26.77	31.21	34.45	38.02	45.24	Growth Rate: 13.54% Standard Deviation: 0.25
Dollars Deflated By Implicit Price Deflator	13.41	15.48	17.76	18.12	20.90	19.47	21.27	22.31	23.15	25.30	Growth Rate: 6.30% Standard Deviation: 0.30
Dollars Deflated By Consumer Price Index	13.41	15.49	17.94	18.44	21.00	19.52	21.25	22.17	22.93	24.94	Growth Rate: 6.08% Standard Deviation: 0.32

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-11

TOTAL EXPENSES ($ Millions)
21 Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	29.41	34.95	40.73	45.41	49.68	55.18	59.45	65.54	73.60	84.12	Growth Rate: 11.50% Standard Deviation: 0.19
Dollars Deflated By Implicit Price Deflator	29.41	33.22	37.01	39.39	40.04	40.12	40.51	42.45	44.81	47.05	Growth Rate: 4.39% Standard Deviation: 0.25
Dollars Deflated By Consumer Price Index	29.41	33.24	37.39	40.09	40.23	40.24	40.48	42.18	44.39	46.38	Growth Rate: 4.18% Standard Deviation: 0.29

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-12

TOTAL EXPENSES ($ Millions)
20 Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	13.41	15.34	18.55	21.34	25.06	27.47	31.43	34.36	39.37	44.49	Growth Rate: 14.07% Standard Deviation: 0.19
Dollars Deflated By Implicit Price Deflator	13.41	14.58	16.85	18.52	20.20	19.97	21.42	22.26	23.97	24.88	Growth Rate: 6.80% Standard Deviation: 0.25
Dollars Deflated By Consumer Price Index	13.41	14.59	17.03	18.84	20.30	20.03	21.40	22.11	23.74	24.52	Growth Rate: 6.58% Standard Deviation: 0.29

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-13

SURPLUS/(DEFICIT) ($ Thousands)
21 Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	-1,409.0	803.1	6.5	-3,265.7	343.1	-1,098.9	-2,340.4	663.5	-772.0	885.4
Dollars Deflated By Implicit Price Deflator	-1,409.0	763.2	5.9	-2,833.3	276.5	-799.1	-1,594.8	429.7	-470.0	495.2
Dollars Deflated By Consumer Price Index	-1,409.0	763.8	6.0	-2,883.1	277.8	-801.3	-1,593.5	427.0	-465.6	488.1

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-14

SURPLUS/(DEFICIT) ($Thousands)
20 Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	2.2	942.0	996.7	-454.6	875.9	-696.9	-221.4	86.5	-1,347.0	747.4
Dollars Deflated By Implicit Price Deflator	2.2	895.2	905.5	-394.4	706.0	-506.8	-150.9	56.0	-820.0	418.0
Dollars Deflated By Consumer Price Index	2.2	895.8	914.8	-401.4	709.3	-508.2	-150.7	55.7	-812.3	412.0

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-15

EARNINGS GAP ($ Millions)
21 Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	11.35	10.21	13.42	16.77	19.89	21.59	25.26	28.06	31.38	34.98	Growth Rate: Standard Deviation:	14.95% 0.43
Dollars Deflated By Implicit Price Deflator	11.35	97.08	12.19	14.55	16.03	15.70	17.21	13.17	19.10	19.56	Growth Rate: Standard Deviation:	7.62% 0.44
Dollars Deflated by Consumer Price Index	11.35	97.14	12.[illegible]2	14.81	16.10	15.75	17.20	18.06	18.92	19.28	Growth Rate: Standard Deviation:	7.40% 0.45

Data deflated using indices readjusted to FY 70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-16

EARNINGS GAP ($ Millions)
20 Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	5.47	6.03	7.33	8.98	11.72	12.13	14.45	15.81	19.46	21.76	Growth Rate: Standard Deviation:	17.02% 0.[illegible]
Dollars Deflated By Implicit Price Deflator	5.47	5.73	6.66	7.79	9.44	8.82	9.83	10.24	11.85	12.17	Growth Rate: Standard Deviation:	9.56% 0.35
Dollars Deflated By Consumer Price Index	5.47	5.74	6.73	7.93	9.49	8.85	9.82	10.18	11.74	12.00	Growth Rate: Standard Deviation:	9.33% 0.38

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-17

EARNED INCOME* ($ Millions)
3 Larger Operas

	FY70	FY71	FY72	FY73	FY741	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	5.47	6.46	7.67	8.29	8.60	10.09	11.13	12.14	12.78	14.76	Growth Rate: 10.93	Standard Deviation: 0.23
Dollars Deflated By Implicit Price Deflator	5.47	6.08	6.97	7.19	6.93	7.34	7.58	7.86	7.78	8.26	Growth Rate: 3.86	Standard Deviation: 0.26
Dollars Deflated By Consumer Price Index	5.47	6.09	7.04	7.32	6.97	7.36	7.58	7.81	7.71	8.14	Growth Rate: 3.65	Standard Deviation: 0.29

*Data includes Endowment earnings.

Data deflated using readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-18

EARNED INCOME* ($ Millions)
17 Smaller Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	2.47	2.91	3.55	4.07	4.75	5.24	5.88	6.41	7.13	7.97	Growth Rate: 13.55	Standard Deviation: 0.28
Dollars Deflated By Implicit Price Deflator	2.47	2.76	3.23	3.53	3.82	3.81	4.00	4.15	4.34	4.46	Growth Rate: 6.31	Standard Deviation: 0.33
Dollars Deflated By Consumer Price Index	2.47	2.76	3.23	3.59	3.84	3.82	4.00	4.12	4.30	4.39	Growth Rate: 6.09	Standard Deviation: 0.36

*Data includes Endowment earnings.

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-19

PRIVATE SUPPORT ($ Millions)
3 Larger Operas

	FY70	FY71	FY72	FY&3	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	2.87	2.91	3.23	3.60	6.51	4.84	7.07	8.07	8.86	11.11	Growth Rate: 17.2 Standard Deviation: 0.7
Dollars Deflated By Implicit Price Deflator	2.87	2.77	2.93	3.12	5.25	3.52	4.82	5.22	5.39	6.21	Growth Rate: 9.7 Standard Deviation: 0.7
Dollars Deflated By Consumer Price Index	2.87	2.77	2.96	3.18	5.27	3.53	4.81	5.19	5.34	6.12	Growth Rate: 9.5 Standard Deviation: 0.7

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-20

PRIVATE SUPPORT ($ Millions)
17 Smaller Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	2.14	3.28	3.76	3.26	3.92	3.44	3.94	4.62	5.70	6.32	Growth Rate: 9.5 Standard Deviation: 0.7
Dollars Deflated By Implicit Price Deflator	2.14	3.12	3.42	2.83	3.16	2.50	2.68	2.99	3.47	3.53	Growth Rate: 2.5 Standard Deviation: 0.7
Dollars Deflated By Consumer Price Index	2.14	3.12	3.45	2.88	3.17	2.51	2.68	2.97	3.44	3.48	Growth Rate: 2.3 Standard Deviation: 0.7

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-21

GOVERNMENT SUPPORT ($ Millions)
3 Larger Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	0.25	0.44	0.91	1.12	1.30	1.76	1.70	1.71	1.72	2.38	Growth Rate: Standard Deviation:	24.03% 2.11
Dollars Deflated By Implicit Price Deflator	0.25	0.41	0.83	0.97	1.05	1.28	1.16	1.11	1.05	1.33	Growth Rate: Standard Deviation:	16.13% 2.04
Dollars Deflated By Consumer Price Index	0.25	0.41	0.84	0.99	1.05	1.28	1.16	1.10	1.04	1.31	Growth Rate: Standard Deviation:	15.89% 2.07

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-22

GOVERNMENT SUPPORT ($ Millions)
17 Smaller Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	0.23	0.34	0.43	0.55	0.87	1.40	1.50	1.50	1.83	2.70	Growth Rate: Standard Deviation:	30.24% 1.06
Dollars Deflated By Implicit Price Deflator	0.23	0.33	0.39	0.47	0.70	1.02	1.02	0.97	1.12	1.51	Growth Rate: Standard Deviation:	21.94% 0.98
Dollars Deflated By Consumer Price Index	0.23	0.33	0.39	0.48	0.70	1.02	1.02	0.97	1.11	1.49	Growth Rate: Standard Deviation:	21.69% 0.99

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-23

SUPPORT INCOME ($ Millions)
3 Larger Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	3.09	3.35	4.14	4.72	7.81	6.60	8.77	9.78	10.58	13.49	Growth Rate: 17.98 Standard Deviation: 0.63
Dollars Deflated By Implicit Price Deflator	3.09	3.18	3.76	4.10	6.29	4.80	5.97	6.33	6.44	7.54	Growth Rate: 10.46 Standard Deviation: 0.62
Dollars Deflated By Consumer Price Index	3.09	3.19	3.80	4.17	6.32	4.81	5.97	6.29	6.38	7.43	Growth Rate: 10.24 Standard Deviation: 0.63

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-24

SUPPORT INCOME ($ Millions)
17 Smaller Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	2.38	3.63	4.19	3.80	4.78	4.84	5.44	6.12	7.53	9.02	Growth Rate: 12.96 Standard Deviation: 0.59
Dollars Deflated By Implicit Price Deflator	2.38	3.45	3.80	3.30	3.86	3.52	3.70	3.97	4.59	5.05	Growth Rate: 5.76 Standard Deviation: 0.59
Dollars Deflated By Consumer Price Index	2.38	3.45	3.84	3.36	3.87	3.53	3.71	3.94	4.54	4.97	Growth Rate: 5.54 Standard Deviation: 0.59

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-25

TOTAL INCOME ($ Millions)
3 Larger Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	8.56	9.75	11.81	13.01	16.41	16.69	19.90	21.92	23.36	28.25	Growth Rate: Standard Deviation:	13.74% 0.26
Dollars Deflated By Implicit Price Deflator	8.56	9.27	10.73	11.29	13.22	12.14	13.56	14.20	14.22	15.80	Growth Rate: Standard Deviation:	6.49% 0.30
Dollars Deflated By Consumer Price Index	8.56	9.27	10.84	11.49	13.29	12.17	13.55	14.11	14.09	15.57	Growth Rate: Standard Deviation:	6.27% 0.32

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-26

TOTAL INCOME ($ Millions)
17 Smaller Operas

	FY70	FY71	FY72	FY73	FY75	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	4.85	6.53	7.74	7.87	9.53	10.08	11.31	12.53	14.66	16.99	Growth Rate: Standard Deviation:	13.22% 0.35
Dollars Deflated By Implicit Price Deflator	4.85	6.21	7.03	6.83	7.68	7.33	7.71	8.11	8.92	9.50	Growth Rate: Standard Deviation:	6.01% 0.38
Dollars Deflate By Consumer Price Index	4.85	6.21	7.10	6.95	7.72	7.35	7.70	8.06	8.84	9.37	Growth Rate: Standard Deviation:	5.79% 0.40

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-27

TOTAL EXPENSES ($ Millions)
3 Larger Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	8.50	9.92	11.72	13.65	15.64	17.00	19.96	21.65	24.59	27.64	Growth Rate: Standard Deviation:	13.75 0.18
Dollars Deflated By Implicit Price Deflator	8.50	9.43	10.65	11.85	12.61	12.36	13.60	14.02	14.97	15.46	Growth Rate: Standard Deviation:	6.50 0.25
Dollars Deflated By Consumer Price Index	8.50	9.44	10.76	12.05	12.57	12.39	13.59	13.93	14.83	15.24	Growth Rate: Standard Deviation:	6.28 0.28

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-28

TOTAL EXPENSES ($ Millions)
17 Smaller Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	4.91	5.42	6.83	7.69	9.42	10.47	11.47	12.72	14.78	16.85	Growth Rate: Standard Deviation:	14.63 0.25
Dollars Deflated By Implicit Price Deflator	4.91	5.15	6.20	6.67	7.59	7.61	7.82	8.24	9.00	9.43	Growth Rate: Standard Deviation:	7.32 0.29
Dollars Deflated By Consumer Price Index	4.91	5.15	6.27	6.79	7.63	7.63	7.81	8.18	8.91	9.29	Growth Rate: Standard Deviation:	7.10 0.32

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-29

SURPLUS/(DEFICIT) ($ Thousands)
3 Larger Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	65.1	-171.1	87.4	-640.7	767.6	-305.4	-65.7	274.1	-1,229.6	613.4
Dollars Deflated By Implicit Price Deflator	65.1	-162.6	79.4	-555.9	618.6	-222.0	-44.8	177.5	-748.5	343.1
Dollars Deflated By Consumer Price Index	65.1	-162.8	80.2	-565.6	621.6	-222.7	-44.8	176.4	-741.5	338.2

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-30

SURPLUS/(DEFICIT) ($ Thousands)
17 Smaller Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	-62.9	1,113.1	909.4	186.0	108.3	-391.6	-155.7	-187.6	-117.4	134.0
Dollars Deflated By Implicit Price Deflator	-62.9	1,057.9	826.2	161.4	87.3	-284.7	-106.1	-121.5	-71.5	75.0
Dollars Deflated By Consumer Price Index	-62.9	1,058.6	834.7	164.2	87.7	-285.5	-106.0	-120.7	-70.8	73.9

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

TABLE 6-31

EARNINGS GAP ($ Millions)
3 Larger Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	3.03	3.52	4.05	5.36	7.04	6.90	8.83	9.50	11.81	12.87	Growth Rate: Standard Deviation:	17.9 0.4
Dollars Deflated By Implicit Price Deflator	3.03	3.35	3.68	4.65	5.67	5.02	6.02	6.15	7.19	7.20	Growth Rate: Standard Deviation:	10.4 0.4
Dollars Deflated By Consumer Price Index	3.03	3.35	3.72	4.74	5.70	5.03	6.01	6.12	7.12	7.10	Growth Rate: Standard Deviation:	10.2 0.4

TABLE 6-32

EARNINGS GAP ($ Millions)
17 Smaller Operas

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	2.44	2.51	3.28	3.62	4.68	5.23	5.59	6.31	7.65	8.89	Growth Rate: Standard Deviation:	15.7 0.3
Dollars Deflated By Implicit Price Deflator	2.44	2.39	2.98	3.14	3.77	3.80	3.81	4.09	4.66	4.97	Growth Rate: Standard Deviation:	8.3 0.3
Dollars Deflated By Consumer Price Index	2.44	2.39	3.01	3.19	3.79	3.81	3.81	4.06	4.61	4.90	Growth Rate: Standard Deviation:	8.1 0.3

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Opera America

CHAPTER 7

THEATER

The nonprofit theater, as an organization type, is relatively young when compared with orchestras, opera companies, and museums. Some mark its beginning with the creation of Theater '47 in Dallas in 1947,[1] but its real growth occurred in the 1960s, aided heavily by a huge inflow of funds from the Ford Foundation. Indeed, the Theatre Communications Group (TCG), which has played an important role in providing communication and cooperation among the theaters, was established in 1961 by the Foundation.[2]

Figure 7-1 shows the founding years of 157 theaters as reported in TCG Survey 1979. It lends credence to the following observation about theater made by an earlier study: "the sixties and early seventies were thus the formative years."[3] Furthermore, the growth in the later period was greatly accelerated with the establishment of the National Endowment for the Arts in 1965. Thus, special attention should be paid to the rate of growth in this sector of the arts in the decade of the seventies.

THE SAMPLE AND THE DATA

As was seen in previous chapters, to develop an accurate picture of growth, a data base uniform over the entire decade is necessary. However, the Ford Foundation data base ended in 1973-74, and the Theatre Communications Group (TCG) began collecting data only in that same year. Hence, two data bases were created:

(1) Eighteen Theaters reporting to both the Ford Foundation and TCG for every year in the decade. This provided a uniform sample of organizations over the decade.

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[1] The Ford Foundation. Theater Reawakening: A Report on Ford Foundation Assistance to American Drama. New York, 1977, p. 7.

[2] Ibid., p. 29.

[3] Mathtech, Inc. The Condition and Needs of the Live Professional Theatre in America, Phase I Report: Data Collection and Analysis. Princeton, NJ, 1978. p. III-67.

FOUNDING YEARS
157 THEATERS REPORTED IN TCG SURVEY 1979

Founding Years	Number of Theaters
Prior to 1950	8
1950 - 1959	11
1960 - 1964	21
1965 - 1969	42
1970 - 1974	57
1975 - 1977	18
	157

Source: Theatre Communications Group, Inc. TCG Survey 1979. New York, 1980. p. 11.

FIGURE 7-1

(2) Twenty-nine Theaters reporting every year to TCG from 1974 through 1979. These were the 18 plus 11 additional theaters, and provided a broader sample for the last five years to the decade. 1974 data collected by TCG had too many problems to resolve adequately. Therefore, the 29 theaters have data for 1975 through 1979.

As with symphony orchestras and opera companies, the theaters are also stratified by budget size as of the end of the decade into four subgroups: small, medium, large, and jumbo. The names of the theaters and budget size of each group are shown in Figure 7-2.

The combination of the Ford Foundation and TCG data bases for the first sample created some major but not insurmountable data problems. Fortunately, the one overlapping year (1973-74) allowed a comparison of data elements in the two surveys. The major areas of difference were these:

(1) In-kind contributions of goods and services

(2) Differences in how data elements were defined, particularly government grants.[4/] Individual data elements on both the income side under private support and earned income and on the expense side were less reliable than the subtotals. Therefore, except tickets and fees (which seemed to have adequate reliability), these were excluded from the analysis.

[4/] In the Ford Foundation study, there were two places a respondent could include a grant from government—either under "grants for services" required, which was part of performance income under earned income, or under support income from government sources. Since earned income is one of two major components of the earning gap, this misplacement of as significant an item as "grants with services" could materially distort the data. TCG (in its early years) gave no instructions; they just listed various data items. In-depth comparisons for 1974 were made so that reporting differences could be accounted for. This problem occurred in 6 of the 18 theaters. We have placed "government grants with services required" under support income in our data, but because of the single government data element under earned income in the Ford Foundation study, we are unable to give a true picture of government support by level of government (federal, state, and local). Performance Income also was not adjusted.

THEATERS IN THE DATA BASE
BY SIZE IN 1980

	Small Theaters $500,000 - $999,999	Medium Theaters $1 Million - $1,499,999	Large Theaters $1.5 Million - $1,999,999	Jumbo Theaters Over $2 Million
Theaters In 10 Year Data Base 1970-1979 "18 Theaters"	A Contemporary Theatre Phoenix Theatre Stage West	Asolo State Theater Cleveland Play House Hartford Stage Company Trinity Square Repertory Company Yale Repertory Theatre	Long Wharf Theatre McCarter Theatre Company Milwaukee Repertory Theater Company Studio Arena Theatre	American Conservatory Theatre Arena Stage Circle in the Square The Guthrie Theater Mark Taper Forum Seattle Repertory Theatre
Additional Theaters In 6 Year Data Base 1974-1979	American Place Theatre Barter Theatre Indiana Repertory Theatre Syracure Stage	The Acting Company Dallas Theater Center Meadow Brook Theatre	Loretto-Hilton Repertory Theatre Old Globe Theatre Alliance Theatre Company	Goodman Theatre
29 Total Theaters in Data Base	7 Theaters	8 Theaters	7 Theaters	7 Theaters

FIGURE 7-2

(3) Timing differences in collecting the responses, resulting in the use of different fiscal years. For example, an organization having a fiscal year November 1, 1973, to October 31, 1974, appears in the 1973-74 Ford Foundation group and in the 1974-75 TCG group

(4) Organizational entity problems that resulted from either of two situations:

(a) The theater operating as part of a "parent" or "sheltering" organization

(b) The inclusion of ancillary programs such as conservatories.

Insofar as possible, an attempt was made to make the Ford Foundation and TCG data bases compatible. Specific major problems and their resolutions are detailed in Appendix B.5/

GROWTH OVER THE DECADE

Figure 7-3 shows total income and total expenses for the sample of 18 theaters over the decade, the difference between the two lines being the surplus/(deficit). Figure 7-4 shows total expenses and earned income; the area between is the well-known earnings gap. These figures would appear to reveal an interesting picture--careful and tight management--that will be discussed below.

To be sure that this was not an accidental fluke in the data, the 18 theaters were stratified by budget size as of the end of the decade6/ into the four subgroups as shown in Figure 7-2. Figures 7-5 through 7-8 show total expenses and total income

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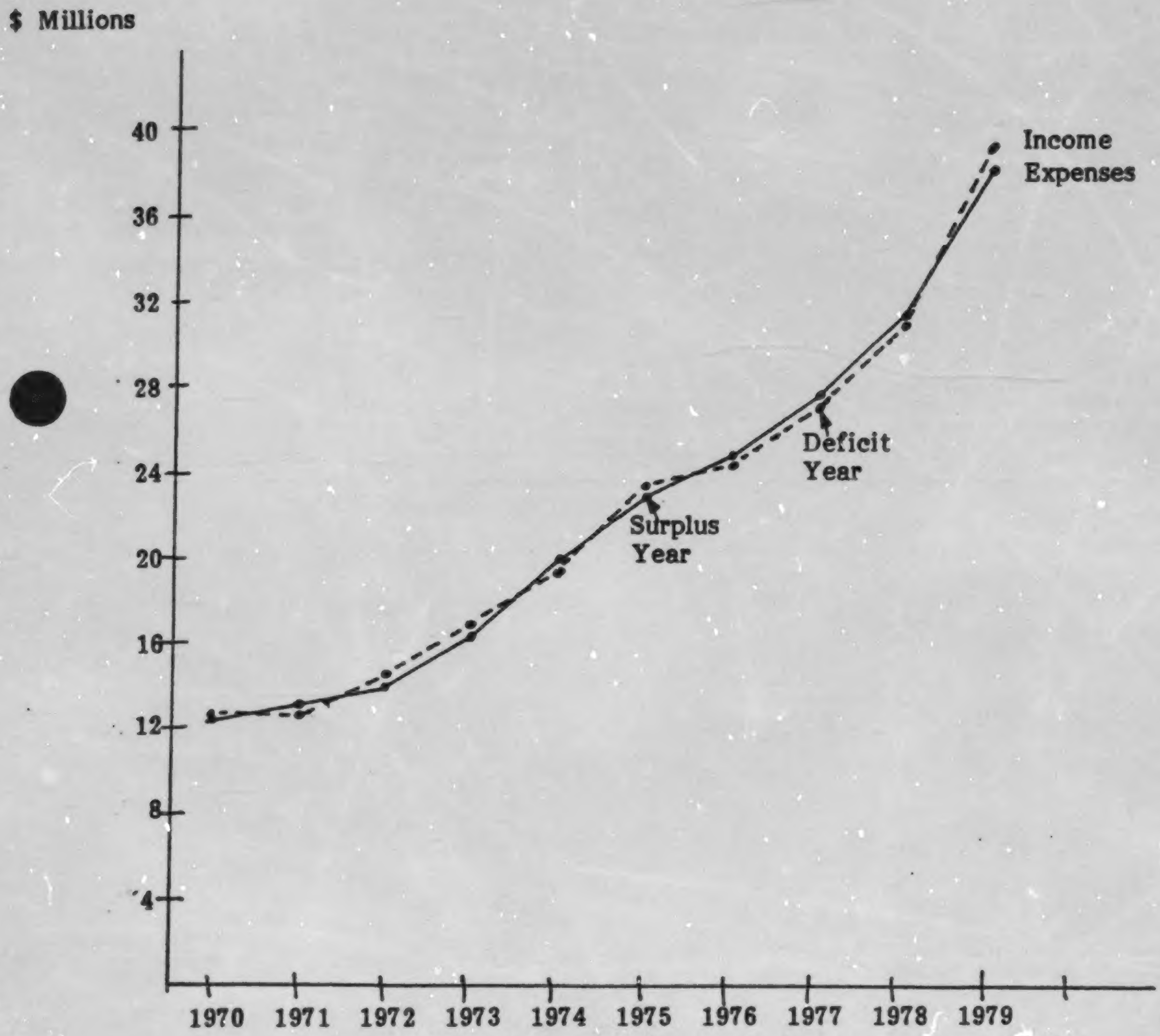
5/ Even with the resolution of many problems, data for some variables varied enough to make the figures appear to be unreliable. This was especially true for artistic versus administrative costs, numbers of productions, and attendance (number of tickets sold) figures. Consequently, we were unable to analyze and discuss these areas.

6/ Data received from TCG was not individual organization data, but rather grouped by budget size in 1980. Thus, we were not able to re-stratify data according to budget size at the beginning of the decade.

TOTAL INCOME AND TOTAL EXPENSES
(Showing Surplus/(Deficit) from Operations)

18 Theaters
1970-1979

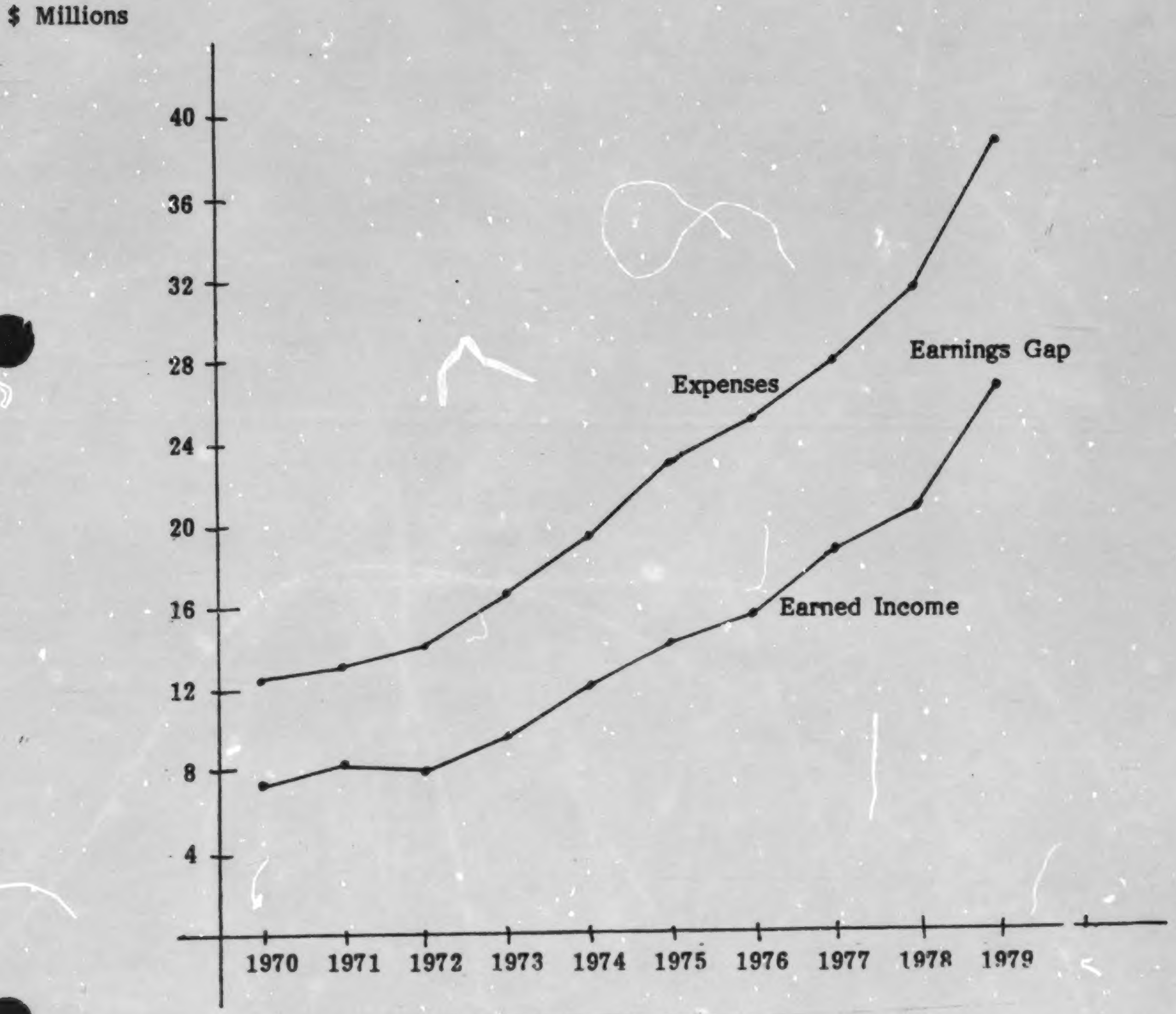


Source: The Ford Foundation and The Theatre Communications Group. See Tables 7-14, 7-15, and 7-16.

FIGURE 7-3

THE EARNINGS GAP

18 Theaters
1970-1979

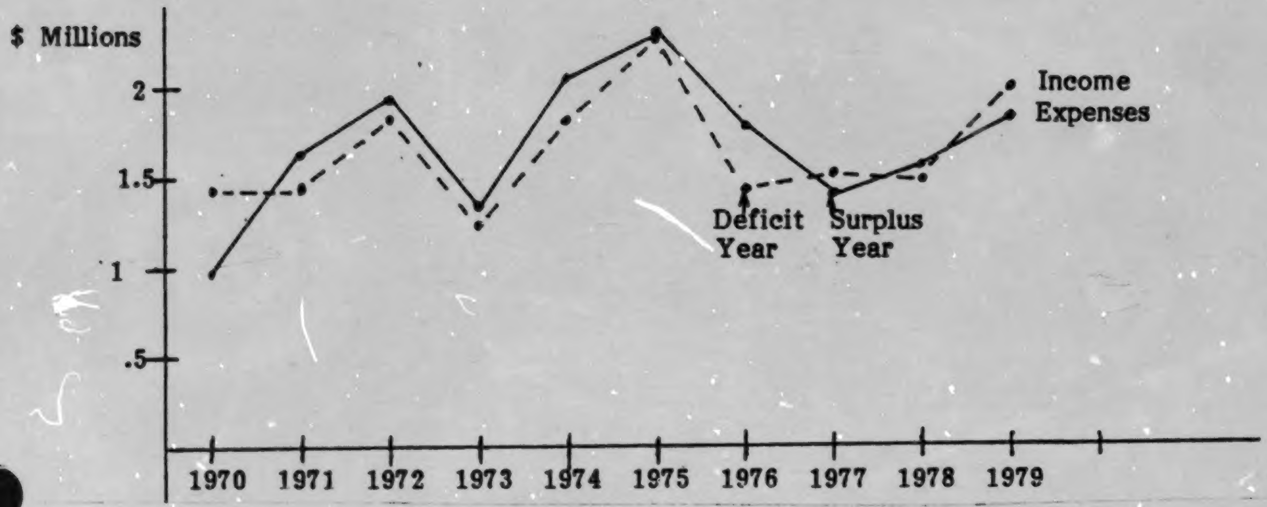


Source: The Ford Foundation and The Theatre Communications Group. See Tables 7-14, 7-15, and 7-17.

FIGURE 7-4

TOTAL INCOME AND TOTAL EXPENSES
(Showing Surplus/(Deficit) from Operations)

3 Small Theaters
1970-1979

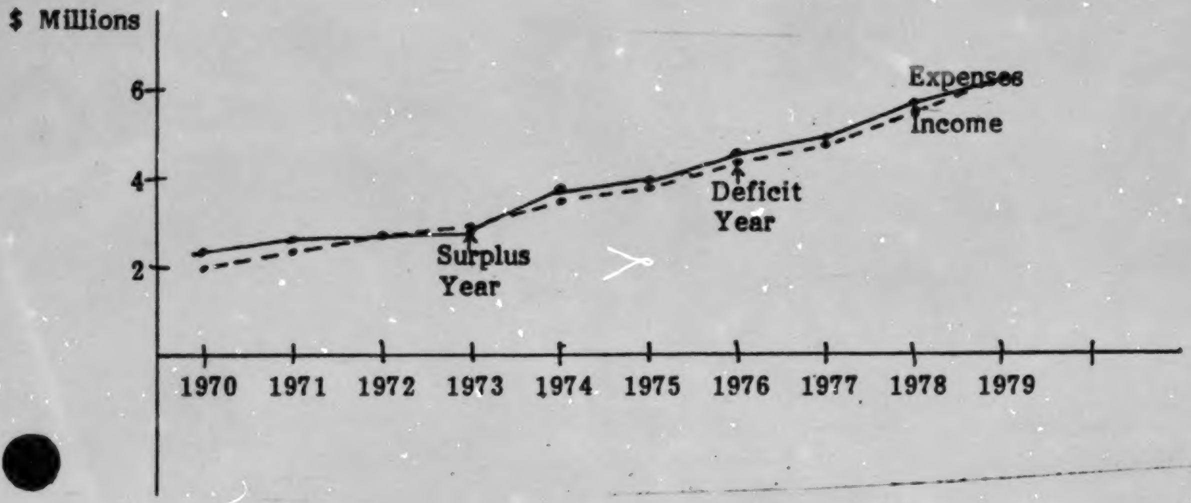


Source: The Ford Foundation and The Theatre Communications Group. See Tables 7-22, 7-23, and 7-25.

FIGURE 7-5

TOTAL INCOME AND TOTAL EXPENSES
(Showing Surplus/(Deficit) from Operations)

5 Medium Theaters
1970-1979

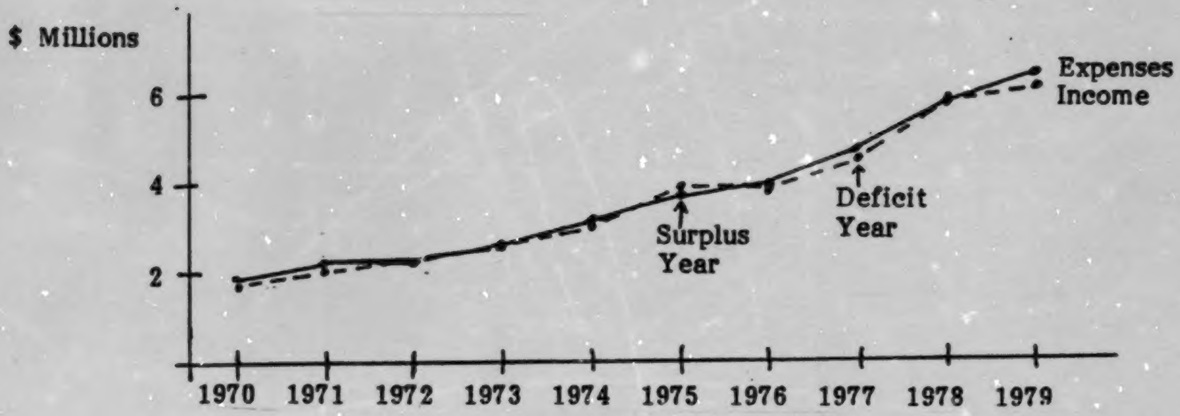


Source: The Ford Foundation and The Theatre Communications Group. See Tables 7-30, 7-31, and 7-33.

FIGURE 7-6

TOTAL INCOME AND EXPENSES
(Showing Surplus/(Deficit) from Operations)

4 Large Theaters
1970-1979

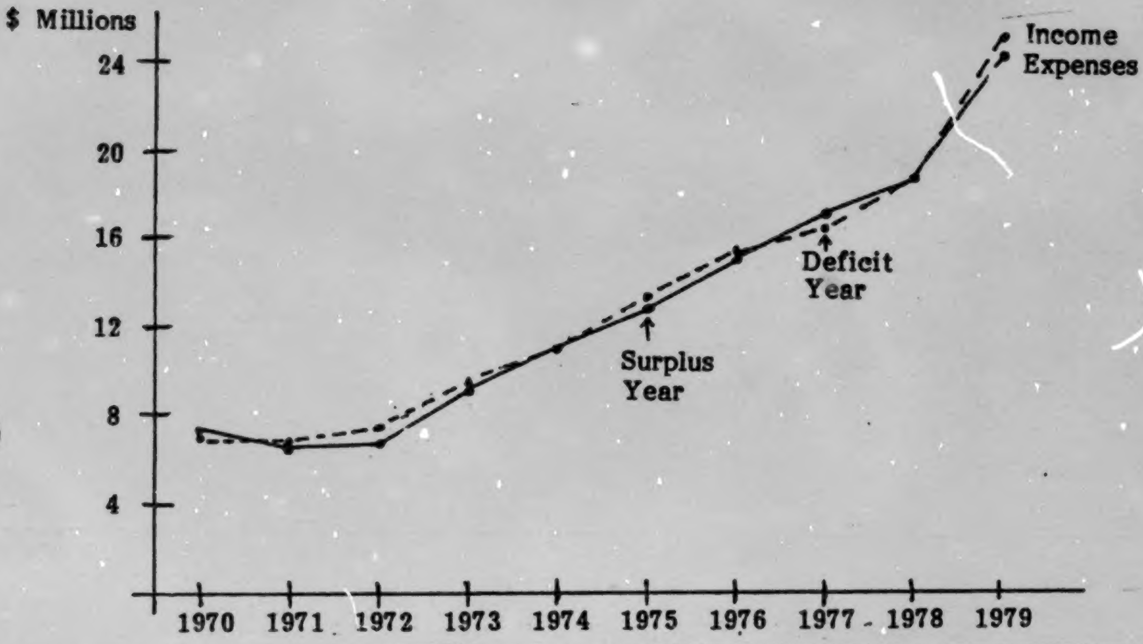


Source: The Ford Foundation and The Theatre Communications Group. See Tables 7-38, 7-39, and 7-41.

FIGURE 7-7

TOTAL INCOME AND EXPENSES
(Showing Surplus/(Deficit) from Operations)

6 Jumbo Theaters
1970-1979



Source: The Ford Foundation and The Theatre Communications Group. See Tables 7-46, 7-47, and 7-49.

FIGURE 7-8

for these subgroups, with each subgroup's accompanying surplus/(deficit). They reveal a similar picture of the same phenomenon. All groups show income and expenses tracking very close to one another throughout the decade. Indeed, even the most volatile group, the small theaters (Figure 7-5), show tight control--an almost parallel movement of income and expenses. To more clearly reveal what occurred and why, the underlying trends and growth patterns need to be examined.

The 18 Theaters: Growth Patterns and Trends

The example in Chapter 4 showed that when earned income and expenditures grow at the same rate, the earnings gap also grows at the same rate. Consequently, if earned income grows at a greater rate than expenditures, then the earnings gap grows at a smaller rate than expenditures, for the additional growth in earned income reduces the size of the gap. For instance, if expenditures double from $50,000 to $100,000, but earned income more than doubles from $40,000 to $85,000, then the gap has less than doubled from $10,000 to $15,000.

Precisely this occurred for the 18 theaters during the seventies. Earned income (Table 7-4) had grown more quickly than had expenditures (Table 7-15); therefore, the earnings gap had grown at a slower pace (Table 7-17). If an organization is to maintain its previous bottom-line balance, it must match every increase in the earnings gap by an increase in support income. Over time, the growth rate of the earnings gap must be matched by the growth rate of total support income, which was the case for the 18 theaters (Tables 7-17 and 7-13).

The difference in the growth of earned income and support income has shifted somewhat the composition of total income (Figure 7-9), especially during the second half of the decade. Earned income grew at such a huge rate in large part because of the large growth of its greatest component: ticket and fees income (Table 7-1). However, since income from tickets and fees grew at a smaller rate than the total earned income, it follows that secondary activities (e.g., booked-in events (Table 7-3), concessions, and interest from investments) grew at much larger rates, since they constitute less than 25 percent of total earned income. (The data for concessions, interest, and other earned income items was not defined and collected in the same

COMPONENTS OF TOTAL INCOME
CHANGE IN PERCENTAGE, 1970-1979

Components of Total Income	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Support Income	40	37	45	41	39	40	37	36	34	32
Earned Income	60	63	55	59	61	60	63	64	66	68
Total Income (%)	100 %	100	100	100	100	100	100	100	100	100
Amount of Total Income ($ Millions)	$12.48	13.02	14.45	16.59	19.54	23.35	24.45	27.03	31.30	39.32

FIGURE 7-9

manner in the Ford Foundation and in the TCG data bases; therefore, growth rates are not available).[7] Thus, the theaters turned to these secondary sources for more income. In fact, a number of the theaters started receiving income from these sources only after mid-decade.

A closer look at the components of support income reveals that, while government support grew at an unusually large rate of 24 percent (Table 7-12), private support (Table 7-7) grew at just about the same rate as the general price level, i.e., about 7 percent (or about 0 percent with inflation removed).

Because of this differential growth, the composition of support income shifted over the decade. Although government support represented only about 20 percent of total support income in the early years of the decade (it had been about 10 to 15 percent in the second half of the 1960s), it increased to about 35 percent by the end of the 1970s (see Figure 7-10). Despite the unusually large increase, however, government support still represented only 12.4 percent of total income in 1978-79 because it started with only a minimal amount at the beginning of the decade (about 5 percent). Furthermore, as a result of the large growth of earned income and of government support income, the position of private support income (which has stayed even with the general economy) has diminished in relation to the other income components, from 35 percent of total income to only 20 percent in 1978-79. Figures 7-11 and 7-12 graph these relationships with and without the effects of inflation.

Government support grew at all levels (Tables 7-9 through 7-12), but both federal and state grants began dropping--even in nominal dollars--after 1974-75. During the last two years they again increased, especially at the federal level, where

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[7] As discussed in Appendix B, the Ford Foundation data base reported interest from endowments as a data item. TCG, however, followed the accounting convention common since the mid-seventies, which places all interest/dividend income that is unrestricted in the operating fund as earned income. Thus, in theaters, the "pure" earnings gap as described in Chapter 4 is not derived. However, the interest/dividend income is small enough to have almost no effect. Thus, the earnings gap derived is operationally the equivalent to the pure earnings gap. This will not be true in the 1980's.

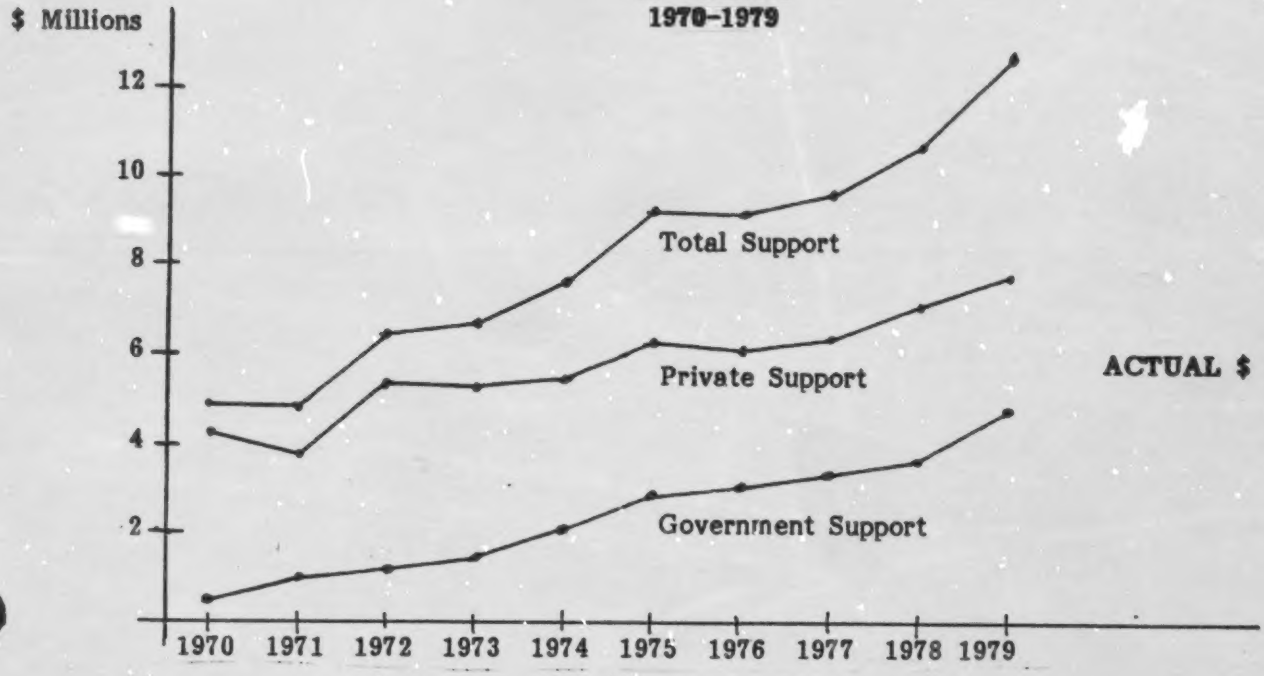
COMPONENTS OF TOTAL SUPPORT
CHANGE IN PERCENTAGE, 1970-1979

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Components of Support Income										
Private Support	87	79	82	77	72	68	67	66	66	62
Government Support	13	21	18	23	28	32	33	34	34	38
Total Support (%)	100%	100	100	100	100	100	100	100	100	100
Amount of Total Support ($ Millions)	$ 4.96	4.83	6.55	6.83	7.62	9.23	9.15	9.71	10.76	12.78

FIGURE 7-10

PRIVATE, GOVERNMENT, AND TOTAL SUPPORT INCOME

18 Theaters
1970–1979



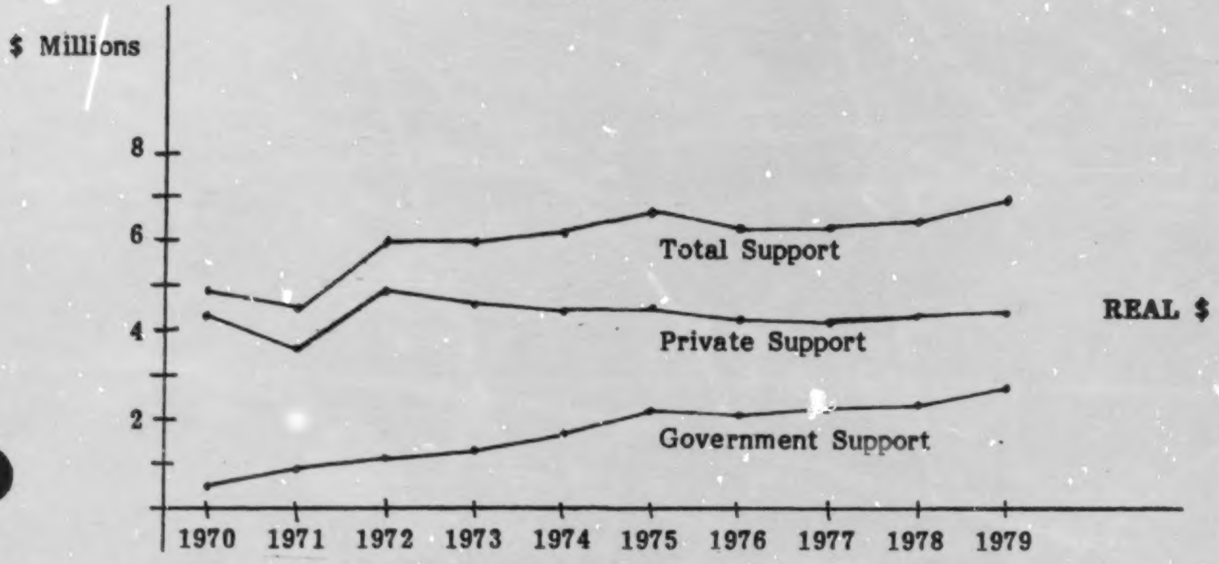
Source: The Ford Foundation and The Theatre Communications Group.

FIGURE 7-11

PRIVATE, GOVERNMENT, AND TOTAL SUPPORT INCOME

(With inflation removed)

18 Theaters
1970-1979



Source: The Ford Foundation and The Theatre Communications Group. See Tables 7-8,7-12, and 7-13.

FIGURE 7-12

they almost doubled, mostly as a result of the NEA's Challenge Grant program (see Chapter 5 for discussion of the program). It should be noted that the Challenge Grants are one-time grants and not of a continuous nature, as are other government grants. According to data supplied by TCG, the 18 theaters received the following amounts from the Challenge Grant program over the decade:

FY78 - $ 517,282

FY79 - $1,020,735

These are included in the amount for federal government grants (Table 7-11) even though they are of a different nature. In fact, if the Challenge Grants are removed from federal support figures, both federal support and total government support have remained virtually constant in real (deflated) terms since 1975-76 (see Figure 7-13).

The slowest growing component of private support was foundation grants, which exhibited about zero growth over the decade in nominal dollars and negative growth in real dollars (Table 7-7). As a result, this component, which represented 36 percent of total private support in 1969-70, fell to 20 percent at the end of the decade. Support from individuals (Table 7-5) grew modestly, but support from businesses and corporations grew by 16 percent over the decade (Table 7-6).

As with opera, two sources of support income had a major influence on the financial structure of the theaters during the decade: the Ford Foundation Cash Reserve Program, developed in 1971 (see Chapter 6) and the NEA's Challenge Grant program, developed in 1976. Both of these programs attempted to shift the focus of grants from "keeping an organization alive a year at a time" to a long-term solution by lifting the organizations to a new level of financial stability.

The amounts received from the Challenge Grant program are shown above. From information published by the Ford Foundation, it is evident that, until 1976, its Cash Reserve Program had provided the 18 theaters with more than $6 million (Figure 7-14). Unfortunately, it is impossible to trace those funds in the financial reports of either the Ford Foundation or the TCG data bases. For even the

FEDERAL GRANTS AND TOTAL GOVERNMENT SUPPORT WITHOUT NEA CHALLENGE GRANTS

($ Millions)

18 Theaters

	FY75	FY76	FY77	FY78	FY79
Federal Grants					
Actual $	1.73	1.66	1.72	1.85	2.03
Real $ using CPI	1.26	1.13	1.10	1.12	1.12
Total Government Support					
Actual $	2.96	3.06	3.34	3.16	3.87
Real $ using CPI	2.16	2.08	2.15	1.91	2.13

FIGURE 7-13

FORD FOUNDATION CASH RESERVE GRANTS
(1971-1976)

Theater	Year	Amount
American Conservatory Theatre	1974	$ 450,000
Arena Stage	1973	642,542
Asolo State Theater	1972	176,955
Mark Taper Forum	1973	865,015
Circle In The Square	1975	1,000,000
The Guthrie Theater	1972	618,828
Hartford Stage Company	1971	239,650
Long Wharf Theatre	1972	265,561
Cleveland Play House	1972	225,706
Seattle Repertory Theatre	1971	305,240
Stage West	1972	149,974
Studio Arena Theatre	1976	418,643
Trinity Square Repertory Company	1971	357,606
Yale Repertory Theatre	1976	506,586
	Total	$6,222,306

Source: The Ford Foundation, Theater Reawakening. p. 39-41.

FIGURE 7-14

former (which had a line #1224 in its survey forms to cover only the Cash Reserve Program) gave specific instructions to include these cash reserve funds "only if this amount is included as operating income on the organization's audited report." Some of these funds obviously went to reduce accumulated deficits. It is possible that some organizations included part of the grants on various other lines of the questionnaires. What is even more interesting and unknown is what the organizations did with these "restricted" funds once the restrictions were lifted (around 1976 for most theaters). As was discussed at length in the orchestra chapter, a thorough analysis of the condition of larger arts organizations is impossible without data on nonoperating funds.

Both the Ford Foundation program (during the first half of the decade) and the NEA Challenge Grants (toward the end of the decade) influenced and encouraged, indeed mandated, the tight management of the theaters over the decade. Another factor should be noted. Unlike the older, more established orchestras, the younger theaters had minimal endowments at best and, therefore, less room for juggling deficits. But as with orchestras and operas, the true, long-run effect of these programs must stand the test of time.

The 18 Theaters: Stratification by Budget Size

Stratification of the 18 theaters into four budget groups previously defined (Figure 7-2)--small, medium, large, and jumbo--reveals that all groups except the small had basically similar patterns of growth (Figure 7-15). The jumbo group exhibited a slower growth for support income (and the earnings gap) and larger growth for earned income. This was due to the slower growth of private support caused by the negative growth of foundation grants, which had constituted more than half of the private support for the jumbo group at the beginning of the decade.

The small group showed negative growth, in real (deflated) terms, of earned income, support income (hence, earnings gap), and expenses. However, this budget group is too small, both in terms of number of organizations (three) and total budget size, to allow for any major influences or generalizations. It would appear that the patterns of growth of the entire sample of 18 is not heavily influenced by any one group, but is characteristic of the individual groups.

GROWTH RATES OF GROUPS OF THEATERS
(1970-1979)

	Groups of Theaters (As described in Figure 7-2)				
Economic Variables	18	Small	Medium	Large	Jumbo
Earned Income	15.1[1]	5.3	12.2	14.7	17.1
	7.6[2]	-1.6	4.8	7.2	9.4
Private Support	7.0	-1.6	12.1	9.8	6.5
	-0.1	-8.1	4.7	2.6	-0.5
Government Support	23.8	19.6	21.9	28.6	24.1
	15.6	11.7	13.9	20.1	16.0
Total Support	11.0	1.2	14.6	14.4	10.8
	3.7	-5.4	7.1	6.9	3.6
Total Income	13.5	1.9	13.3	14.6	15.0
	6.1	-4.8	5.8	7.1	7.4
Total Expenses	13.6	3.0	12.2	14.7	15.2
	6.1	-3.7	4.8	7.1	7.6
Earnings Gap	10.9	4.1	12.2	14.6	11.3
	3.6	-2.8	4.8	7.1	4.0

[1] Growth rate of actual dollars.

[2] Growth rate as deflated by the Consumer Price Index.

FIGURE 7-15

THE 29 THEATERS

If one compares the growth of the larger group of 29 theaters (the 18 plus an additional 11) for the second half of the decade, two major observations appear:

(1) Although total operating income grew at the same rate, total operating expenses and the earnings gap grew at a greater rate for the 29.

(2) There are variations in the growth of the components of total income.

Figure 7-16 compares growth rates of the 29 and the 18 from 1975 through 1979. The year 1973-74 was omitted because severe data problems raised serious questions about its reliability.

Because an explanation of these observations was sought, these theaters were broken up by budget size, as shown in Figure 7-2. The bottom half of Figure 7-2 indicates that the set of 11, which contains only one jumbo theater, is most representative of the theaters with budgets less than $2 million. The growth rates[8/] for the group of 11 were calculated and are also shown in Figure 7-16 (Tables 7-67 through 7-74). These were then compared with the growth rates for the stratified groups of the 18. The 11 followed the pattern of the medium and large groups for income, but the growth of expenses looks more like the jumbo group. The 11 had a smaller growth of earned income and a larger growth of private support and total support than did the 18. However, since the jumbo theaters represent over 60 percent of the dollars of the 18, the differences in growth rates on the income side can be explained as due to the biasing effect of the jumbos.

The first observation (expenses and earnings gap growing faster than income) runs contrary to the pattern of the budget groups of the 18. It is even more puzzling in that such a discrepancy between the growth of income and that of expenses indicates a sizable deficit, which is confirmed in Figure 7-17 and Table 7-73. The

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[8/] These growth rates are based on five years of data, as opposed to the ten years for other sets of growth rates.

GROWTH RATES OF GROUPS OF THEATERS
1975 - 1979

	Groups of Theaters (as described in Figure 7-2)		
Economic Variables	18	29	11
Earned Income	16.8 1/	15.8	12.9
	9.2 2/	8.2	5.4
Private Support	6.3	8.2	14.7
	-0.7	1.1	7.1
Government Support	12.7	14.3	19.1
	5.2	6.8	11.3
Total Support	8.5	10.3	17.1
	1.3	3.1	9.4
Total Income	13.8	13.8	13.8
	6.3	6.3	6.3
Total Expenses	13.4	13.8	15.2
	5.9	6.3	7.6
Earnings Gap	7.2	10.3	16.8
	0.2	3.1	9.1

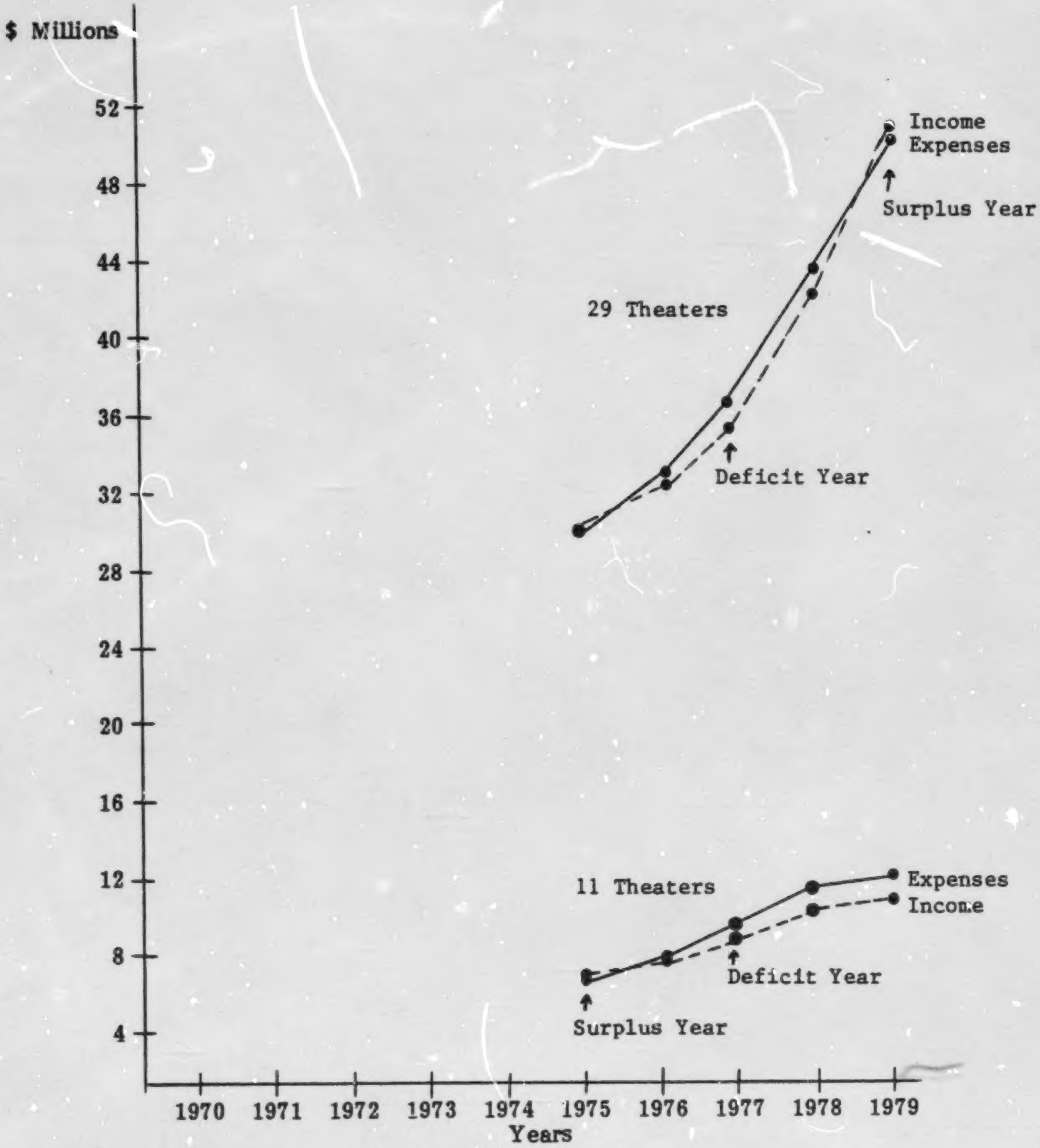
1/Growth rate of actual dollars.

2/Growth rate as deflated by the Consumer Price Index.

FIGURE 7-16

TOTAL INCOME AND TOTAL EXPENSES
(Showing Surplus/(Deficit) from operations)
29 Theaters and 11 Theaters

1975 - 1979



Source: The Theatre Communications Group.
See Tables 7-63, 7-64, 7-65, 7-71, 7-72, and 7-73.

FIGURE 7-17

tight management of the 18 theaters is not entirely reflected by the 11 with their growing deficit. However, four years of deficits is not enough to know whether a trend is temporary or permanent in nature. The question is, How was the deficit covered? It would seem that it had to be covered from different fund balances--e.g., endowment, plant, reserves--as was the case with the 17 Major orchestras (Chapter 5). Unfortunately, the TCG data did not supply this information. However, it would appear from several sources contacted that it was indeed a case of fund balancing of deficits. Whatever the case may be, the 11 behaved somewhat differently in this respect than did the 18 as a whole or than did any of major subgroups of the 18. Rather, they behaved similarly to the other 14 Major and Regional orchestras which accumulated deficits during the latter half of the decade.

The stratification of the group of 18 by budget size, as well as its comparison with the 29 for the last five years, indicates that although variations exist, the 18 are indicative overall of the field of theaters with budgets greater than $500,000. Specifically, this universe of larger theaters appears to have exhibited strong real growth and very balanced and managed growth over the decade. But can inferences be made about the broader universe or nonprofit theater?

THE UNIVERSE OF THEATERS

While the larger theaters represent the major part of the theater universe in terms of budget size--indeed, the 18 alone represented about one-third of the total budgets of all 147 theaters reporting to TCG in 1979-80[9/]--they do not in terms of number of organizations. How, then, did the theaters with budgets of $500,000 or less grow over the decade? Fortunately, there is a source of at least partial information.

Figures 7-18 through 7-21 show the income and expenses as well as the yearly percentage changes and compounded growth rates for the period 1975-76 through 1979-80 for two groups of theaters as reported by TCG. Group I consists of 30 theaters with budgets over $500,000, and is very similar to the set of 29 in our sample in that the two sets contain 24 theaters in common. Group II consists of 30 theaters

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[9/] Theatre Communications Group, Inc. Theatre Facts 80. New York, 1981.

GROUP I: 30 LARGER THEATERS
1976-1980
($ Thousands)

Economic Variables	1976	1977	1978	1979	1980
Earned Income	21,030	24,408	28,374	35,942	36,186
Total Expenses	32,259	36,405	42,496	51,195	53,552
Earnings Gap	11,230	11,997	14,122	15,252	17,366
Unearned (Support) Income	10,809	11,071	13,518	16,015	18,175
Total Income	31,839	35,479	41,892	51,958	54,361
Surplus/Deficit	(420)	(926)	(604)	763	809

Source: The Theatre Communications Group. Theatre Facts 80. p. 23.

FIGURE 7-18

GROUP I: 30 LARGER THEATERS
1976-1980

(Percent Changes in Income and Expenses)

Economic Variables	1975-6	1976-7	1977-8	1978-9	1979-80	CGR* 76-80
Earned Income	18.6	16.1	16.3	26.7	.7	15.9
Total Expenses	19.6	12.9	16.7	20.5	4.6	14.5
Unearned Income	11.6	2.4	22.1	18.5	13.5	15.1
Total Income	16.1	11.4	18.1	24.0	4.6	15.6

*Compounded growth rate.

Source: The Theatre Communications Group. Theatre Facts 80. p.24.

FIGURE 7-19

GROUP I: 30 SMALLER THEATERS
1976-1980
($ Thousands)

Economic Variables	1976	1977	1978	1979	1980
Earned Income	1,597	1,963	2,558	3,191	3,944
Total Expenses	3,480	4,468	5,945	7,099	8,412
Earnings Gap	1,883	2,505	3,387	3,908	4,468
Unearned (Support) Income	1,734	2,395	3,147	3,785	4,417
Total Income	3,332	4,358	5,705	6,977	8,360
Surplus/Deficit	(148)	(110)	(240)	(122)	(52)

Source: The Theatre Communications Group. Theatre Facts 80. p. 55.

FIGURE 7-20

GROUP I: 30 SMALLER THEATERS
1976-1980

(Percent Changes in Income and Expenses)

Economic Variables	1976-7	1977-8	1978-9	1979-80	CGR* 76-80
Earned Income	22.9	30.3	24.8	23.6	25.8
Total Expenses	28.4	33.1	19.4	18.5	25.0
Unearned Income	38.1	31.4	20.3	16.7	26.2
Total Income	30.8	30.9	22.3	19.8	26.0

*Compounded growth rate.

Source: The Theatre Communications Group. Theatre Facts 80. p. 55.

FIGURE 7-21

with budgets between $100,000 and $500,000--the smaller theaters. The data indicate that at least for the last five years of the decade, two developments occurred.

(1) The smaller theaters grew at a much more rapid rate than the larger ones, while still maintaining very balanced patterns of growth. The larger theaters had one very slow growth year in 1979-80. This pattern fits the thesis expounded in Chapter 4.

(2) The smaller theaters ran heavier deficits than the larger theaters, not only in that they had deficits throughout the five years, but also in that their deficits were much larger relative to their total budgets. The larger theaters showed surpluses in the last two years. But even the smaller theaters showed a decreasing pattern of deficits in the last two years.

The latter observation would seem to indicate, again, the funding of the deficit from different sources. However, as a group the smaller theaters tend to have smaller reserves, if any, on which to draw to cover deficits. Furthermore, these theaters did not receive Ford Foundation Cash Reserve Grants; most were too small or just getting organized in the early seventies. But whatever the situation, deficits cannot continue indefinitely. It was shown in Chapter 5 that even the major orchestras--with endowments immensely larger than those of theaters--eventually had to slow down on this practice of incurring deficits.

It should be noted that even the smaller theaters in Group II have budgets over $100,000. No sample of theaters with less than $100,000 budgets was available. Hence, any inferences that can be drawn can reflect only the universe of theaters with budgets over $100,000. Nothing can be said about the much larger universe, as estimated in Chapter 3, containing the hundreds of smaller theaters.

TABLE 7-1

INCOME FROM TICKET SALES AND PERFORMANCE FEES ($ Millions)
18 Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	6.42	7.49	7.00	8.52	10.36	11.45	12.49	14.12	16.64	20.86	Growth Rate: Standard Deviation:	13.55% .34
Dollars Deflated By Implicit GNP Deflator	6.42	7.11	6.36	7.39	8.35	8.33	8.51	9.15	10.13	11.67	Growth Rate: Standard Deviation:	6.31% .31
Dollars Deflated By Consumer Price Index	6.42	7.12	6.42	7.52	8.39	8.35	8.50	9.09	10.03	11.50	Growth Rate: Standard Deviation:	6.09% .29

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-2

TOTAL PERFORMANCE INCOME* ($ Millions)
18 Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	6.64	7.77	8.24	9.17	11.19	11.88	13.09	14.96	17.26	21.70	Growth Rate: Standard Deviation:	13.12% .25
Dollars Deflated By Implicit GNP Deflator	6.64	7.38	7.49	7.96	9.02	8.64	8.92	9.69	10.51	12.14	Growth Rate: Standard Deviation:	5.91% .24
Dollars Deflated By Consumer Price Index	6.64	7.39	7.56	8.10	9.06	8.66	8.91	9.63	10.41	11.96	Growth Rate: Standard Deviation:	5.69% .23

*Includes "Grants with Services Required"

Data deflated using indices readjusted to FY70 as the base
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE

INCOME FROM BOOKED-IN EVENTS* ($ Millions)
18 Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	.52	.15	.14	.31	.24	1.22	1.16	1.16	1.58	2.15	Growth Rate: 31.69% Standard Deviation: 3.84
Dollars Deflated By Implicit GNP Deflator	.52	.14	.13	.27	.19	.89	.79	.75	.96	1.20	Growth Rate: 23.29% Standard Deviation: 3.51
Dollars Deflated By Consumer Price Index	.52	.14	.13	.28	.19	.89	.79	.75	.95	1.19	Growth Rate: 23.04% Standard Deviation: 3.49

*Performances not produced by the theater, but held in the theater's space.
Data deflated using indices readjusted to FY70 as the base; growth rates calculated over 9 years.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-4

TOTAL EARNED INCOME* ($ Millions)
18 Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	7.52	8.18	7.91	9.76	11.92	14.12	15.31	17.32	20.55	26.54	Growth Rate: 15.12% Standard Deviation: .42
Dollars Deflated By Implicit GNP Deflator	7.52	7.78	7.18	8.47	9.60	10.27	10.43	11.22	12.51	14.85	Growth Rate: 7.79% Standard Deviation: .34
Dollars Deflated By Consumer Price Index	7.52	7.78	7.26	8.61	9.65	10.30	10.42	11.15	12.39	14.63	Growth Rate: 7.56% Standard Deviation: .31

*Excludes "Grants with Services Required"
Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE

CONTRIBUTIONS FROM INDIVIDUALS ($ Millions)
18 Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.30	.85	1.42	1.48	1.33	2.20	1.80	1.86	2.01	2.10	Growth Rate: 8.03%	Standard Deviation: .94
Dollars Deflated By Implicit GNP Deflator	1.30	.81	1.29	1.29	1.07	1.60	1.23	1.21	1.22	1.18	Growth Rate: 1.42%	Standard Deviation: .87
Dollars Deflated By Consumer Price Index	1.30	.81	1.31	1.31	1.08	1.61	1.23	1.20	1.21	1.16	Growth Rate: .94%	Standard Deviation: .88

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-6

CONTRIBUTIONS FROM BUSINESS ($ Millions)
18 Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.29	.22	.35	.34	.40	.44	.47	.63	.88	1.07	Growth Rate: 16.70%	Standard Deviation: .91
Dollars Deflated By Implicit GNP Deflator	.29	.21	.32	.30	.32	.32	.32	.41	.54	.60	Growth Rate: 9.26%	Standard Deviation: .84
Dollars Deflated By Consumer Price Index	.29	.21	.32	.30	.32	.32	.32	.41	.53	.59	Growth Rate: 9.04%	Standard Deviation: .83

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE

GRANTS AND CONTRIBUTIONS FROM FOUNDATIONS* ($ Millions)

18 Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.57	1.68	1.62	1.49	1.82	1.78	1.96	1.63	1.40	1.61	Growth Rate: Standard Deviation:	-.16% .50
Dollars Deflated By Implicit GNP Deflator	1.57	1.60	1.48	1.30	1.47	1.29	1.33	1.05	.85	.90	Growth Rate: Standard Deviation:	-6.53% .46
Dollars Deflated By Consumer Price Index	1.57	1.60	1.49	1.32	1.48	1.30	1.33	1.05	.84	.89	Growth Rate: Standard Deviation:	-6.72% .46

*Does not include "Grants with Services Required" which was under $50,000 in all years except 1979, when it was $190,000.

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-3

TOTAL PRIVATE SUPPORT* ($ Millions) ($ Millions)

18 Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	4.34	3.82	5.38	5.27	5.50	6.27	6.09	6.37	7.08	7.88	Growth Rate: Standard Deviation:	6.96% .40
Dollars Deflated By Implicit GNP Deflator	4.34	3.63	4.89	4.57	4.43	4.56	4.15	4.13	4.31	4.41	Growth Rate: Standard Deviation:	.14% .41
Dollars Deflated By Consumer Price Index	4.34	3.63	4.94	4.65	4.46	4.57	4.14	4.10	4.27	4.35	Growth Rate: Standard Deviation:	-.07% .41

*Includes "Grants with Services Required" which ranges from $160,000 in 1970 to $280,000 in 1979.

Data deflated using indices readjusted to FY70 as the base.
Source of Data: American Symphony Orchestra League

TABLE

GRANTS FROM LOCAL GOVERNMENT* ($ Millions)
18 Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	.11	.04	.12	.12	.18	.16	.29	.21	.36	.39	Growth Rate: 21.9 Standard Deviation: 2.1
Dollars Deflated By Implicit GNP Deflator	.11	.04	.11	.11	.14	.12	.20	.14	.22	.22	Growth Rate: 13.8 Standard Deviation: 1.9
Dollars Deflated By Consumer Price Index	.11	.04	.11	.11	.14	.12	.20	.14	.22	.22	Growth Rate: 13.5 Standard Deviation: 1.9

*Does not include "Grants with Services Required".
Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-10

GRANTS FROM STATE GOVERNMENT* ($ Millions)
18 Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	.03	.21	.15	.19	.38	.83	.73	.68	.81	.99	Growth Rate: 38.2 Standard Deviation: 3.5
Dollars Deflated By Implicit GNP Deflator	.03	.20	.13	.16	.30	.61	.49	.44	.49	.55	Growth Rate: 29.4 Standard Deviation: 3.3
Dollars Deflated By Consumer Price Index	.03	.20	.13	.16	.30	.61	.49	.44	.49	.54	Growth Rate: 29.1 Standard Deviation: 3.3

*Does not include "Grants with Services Required".
Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7[illegible]

GRANTS FROM THE FEDERAL GOVERNMENT* ($ Millions)
18 Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	.37	.62	.67	.97	1.22	1.73	1.66	1.72	2.37	3.05	Growth Rate: 23.67% Standard Deviation: .91
Dollars Deflated By mplicit GNP Deflator	.37	.59	.61	.84	.98	1.26	1.13	1.11	1.44	1.71	Growth Rate: 15.78% Standard Deviation: .88
Dollars Deflated By Consumer Price Index	.37	.59	.61	.86	.99	1.26	1.13	1.10	1.43	1.68	Growth Rate: 15.55% Standard Deviation: .90

*Does not include "Grants with Services Required".
Data deflated using indices readjusted to FY7C as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-12

TOTAL GOVERNMENT SUPPORT* ($ Millions)
18 Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	.62	1.01	1.16	1.57	2.12	2.96	3.06	3.34	3.68	4.89	Growth Rate: 23.77% Standard Deviation: .91
Dollars Deflated By mplicit GNP Deflator	.62	.96	1.06	1.36	1.71	2.15	2.09	2.16	2.24	2.74	Growth Rate: 15.88% Standard Deviation: .88
Dollars Deflated By Consumer Price Index	.62	.96	1.07	1.38	1.72	2.16	2.08	2.15	2.22	2.70	Growth Rate: 15.64% Standard Deviation: .90

*Includes "Grants with Services Required" which ranges from $65,000 in 1970 to $462,000 in 1979.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theater Communications Group

TABLE 7

TOTAL SUPPORT INCOME* ($ Millions)
18 Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	4.96	4.83	6.55	6.83	7.62	9.23	9.15	9.71	10.76	12.78	Growth Rate: Standard Deviation:	10.95% .37
Dollars Deflated By Implicit GNP Deflator	4.96	4.59	5.95	5.93	6.14	6.71	6.23	6.29	6.55	7.15	Growth Rate: Standard Deviation:	3.88% .36
Dollars Deflated By Consumer Price Index	4.96	4.59	6.01	6.03	6.17	6.73	6.23	6.25	6.49	7.04	Growth Rate: Standard Deviation:	3.67% .39

*Includes "Grants with Services Required" - See Tables 11-8 and 11-12.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-14

TOTAL INCOME ($ Millions)
18 Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	12.48	13.02	14.45	16.59	19.54	23.35	24.45	27.03	31.30	39.32	Growth Rate: Standard Deviation:	13.53% .27
Dollars Deflated By Implicit GNP Deflator	12.48	12.37	13.13	14.39	15.74	16.98	16.66	17.50	19.06	21.99	Growth Rate: Standard Deviation:	6.30% .21
Dollars Deflated By Consumer Price Index	12.48	12.38	13.26	14.65	15.82	17.03	16.65	17.39	18.88	21.68	Growth Rate: Standard Deviation:	6.08% .21

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7

TOTAL EXPENSES ($ Millions)
18 Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	12.46	13.28	14.03	16.46	20.02	23.04	24.92	27.91	31.50	38.37	Growth Rate: Standard Deviation:	13.56% .25
Dollars Deflated By Implicit GNP Deflator	12.46	12.26	12.75	14.28	16.14	16.75	16.98	18.08	19.18	21.46	Growth Rate: Standard Deviation:	6.33% .19
Dollars Deflated By Consumer Price Index	12.46	12.63	12.88	14.54	16.21	16.80	16.97	17.96	19.00	21.15	Growth Rate: Standard Deviation:	6.11% .18

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-16

OPERATING SURPLUS/(DEFICIT) ($ Thousands)
18 Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	204	-266	420	126	-487	311	-466	-887	-200	953
Dollars Deflated By Implicit GNP Deflator	204	-253	381	109	-392	226	-318	-574	-122	533
Dollars Deflated By	204	-253	385	111	-394	227	-317	-571	-121	525

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7[illegible]

EARNINGS GAP ($ Millions)
18 Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	4.94	5.10	6.13	6.71	8.11	8.91	9.61	10.59	10.96	11.82	Growth Rate: Standard Deviation:	10.93% .29
Dollars Deflated By Implicit GNP Deflator	4.94	4.84	5.57	5.82	6.53	6.48	6.55	6.86	6.67	6.61	Growth Rate: Standard Deviation:	3.86% .31
Dollars Deflated By Consumer Price Index	4.94	4.85	5.62	5.92	6.57	6.50	6.55	6.82	6.61	6.52	Growth Rate: Standard Deviation:	3.65% .33

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7

EARNED INCOME ($ Millions)
3 Small Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.70	1.04	.31	.45	.87	1.27	.68	.71	.89	1.08	Growth Rate: Standard Deviation:	5.34% 2.12
Dollars Deflated By Implicit GNP Deflator	.70	.99	.28	.39	.70	.93	.46	.46	.54	.60	Growth Rate: Standard Deviation:	-1.37% 1.93
Dollars Deflated By Consumer Price Index	.70	.99	.28	.40	.70	.93	.46	.46	.54	.59	Growth Rate: Standard Deviation:	-1.58% 1.91

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-19

PRIVATE SUPPORT ($ Millions)
3 Small Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Consumer Price Index	.71	.28	1.42	.62	.72	.62	.47	.55	.52	.66	Growth Rate: Standard Deviation:	-1.60% 2.37
Dollars Deflated By Implicit GNP Deflator	.71	.26	1.30	.53	.58	.45	.27	.35	.32	.37	Growth Rate: Standard Deviation:	-7.88% 2.23
Dollars Deflated By Consumer Price Index	.71	.26	1.30	.55	.59	.45	.27	.35	.32	.36	Growth Rate: Standard Deviation:	-8.07% 2.24

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-

GOVERNMENT SUPPORT ($ Millions)
3 Small Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	.017	.13	.13	.19	.26	.39	.29	.27	.11	.28	Growth Rate: 19.55% Standard Deviation: 4.35
Dollars Deflated By Implicit GNP Deflator	.017	.12	.12	.16	.21	.29	.20	.17	.066	.16	Growth Rate: 11.91% Standard Deviation: 4.12
Dollars Deflated By Consumer Price Index	.017	.12	.12	.17	.21	.29	.20	.17	.066	.16	Growth Rate: 11.72% Standard Deviation: 4.12

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-21

TOTAL SUPPORT ($ Millions)
3 Small Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	.72	.41	1.56	.81	.98	1.01	.76	.82	.63	.95	Growth Rate: 1.25% Standard Deviation: 1.76
Dollars Deflated By Implicit GNP Deflator	.72	.39	1.41	.70	.79	.73	.52	.53	.38	.53	Growth Rate: -5.22% Standard Deviation: 1.67
Dollars Deflated By Consumer Price Index	.72	.39	1.43	.71	.79	.73	.52	.53	.38	.52	Growth Rate: -5.40% Standard Deviation: 1.69

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7

TOTAL INCOME ($ Thousands)
3 Small Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.42	1.45	1.86	1.25	1.84	2.28	1.44	1.53	1.51	2.03	Growth Rate: Standard Deviation:	1.9 .9
Dollars Deflated By Implicit GNP Deflator	1.42	1.38	1.69	1.09	1.49	1.66	.98	.99	.92	1.13	Growth Rate: Standard Deviation:	-4.5 .8
Dollars Deflated By Consumer Price Index	1.42	1.38	1.71	1.11	1.49	1.66	.98	.98	.91	1.12	Growth Rate: Standard Deviation:	-4.7 .8

No Growth Rates shown because of differently reported data in 1979.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-23

TOTAL EXPENSES ($ Millions)
3 Small Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.98	1.64	1.94	1.36	2.11	2.32	1.82	1.43	1.60	1.84	Growth Rate: Standard Deviation:	3.0 1.2
Dollars Deflated By Implicit GNP Deflator	.98	1.56	1.76	1.18	1.70	1.69	1.24	.92	.97	1.03	Growth Rate: Standard Deviation:	-3.5 1.2
Dollars Deflated By Consumer Price Index	.98	1.56	1.78	1.20	1.71	1.69	1.24	.92	.97	1.01	Growth Rate: Standard Deviation:	-3.7 1.2

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7

SURPLUS/(DEFICIT) ($ Thousands)
3 Small Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	444	-190	-74	-104	-266	-35	-375	103	-86	187
Dollars Deflated By Implicit GNP Deflator	444	-181	-67	-90	-214	-25	-256	67	-52	105
Dollars Deflated By Consumer Price Index	444	-181	-68	-92	-215	-26	-255	66	-52	103

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-25

EARNINGS GAP ($ Millions)
3 Small Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	.29	.60	1.63	.91	1.24	1.05	1.14	.72	.71	.76	Growth Rate: 4.08% Standard Deviation: 2.48
Dollars Deflated By Implicit GNP Deflator	.28	.57	1.48	.79	1.00	.76	.77	.47	.43	.43	Growth Rate: -2.55% Standard Deviation: 2.37
Dollars Deflated By Consumer price Index	.28	.57	1.50	.80	1.01	.76	.77	.46	.43	.42	Growth Rate: -2.75% Standard Deviation: 2.39

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7 [illegible]

EARNED INCOME ($ Millions)
5 Medium Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.18	1.25	1.28	1.46	1.65	1.77	1.93	2.26	2.83	3.38	Growth Rate: Standard Deviation:	12.17% .43
Dollars Deflated By Implicit GNP Deflator	1.18	1.19	1.16	1.27	1.33	1.28	1.32	1.46	1.72	1.89	Growth Rate: Standard Deviation:	5.02% .38
Dollars Deflated By Consumer Price Index	1.18	1.19	1.17	1.29	1.34	1.29	1.31	1.46	1.71	1.87	Growth Rate: Standard Deviation:	4.80% .36

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-27

PRIVATE SUPPORT ($ Millions)
5 Medium Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.65	.74	1.09	1.06	1.29	1.29	1.69	1.67	1.77	1.79	Growth Rate: Standard Deviation:	12.06% .62
Dollars Deflated By Implicit GNP Deflator	.65	.70	.99	.92	1.04	.93	1.15	1.08	1.08	1.00	Growth Rate: Standard Deviation:	4.92% .64
Dollars Deflated By Consumer Price Index	.65	.71	1.00	.94	1.04	.94	1.15	1.08	1.07	.99	Growth Rate: Standard Deviation:	4.69% .66

Data Deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE [illegible]

GOVERNMENT SUPPORT ($ Millions)
5 Medium Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	.14	.25	.32	.39	.57	.71	.74	.76	.87	.99	Growth Rate: 21.94% Standard Deviation: 1.21
Dollars Deflated By Implicit GNP Deflator	.14	.24	.29	.34	.46	.52	.50	.50	.53	.56	Growth Rate: 14.18% Standard Deviation: 1.18
Dollars Deflated By Consumer Price Index	.14	.24	.30	.35	.46	.52	.50	.49	.53	.55	Growth Rate: 13.92% Standard Deviation: 1.21

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-29

TOTAL SUPPORT ($ Millions)
5 Medium Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	.79	.99	1.41	1.46	1.86	2.00	2.43	2.44	2.64	2.78	Growth Rate: 14.64% Standard Deviation: .67
Dollars Deflated By Implicit GNP Deflator	.79	.94	1.28	1.26	1.50	1.45	1.65	1.58	1.61	1.56	Growth Rate: 7.33% Standard Deviation: .68
Dollars Deflated By Consumer Price Index	.79	.94	1.29	1.29	1.50	1.46	1.65	1.57	1.59	1.53	Growth Rate: 7.12% Standard Deviation: .71

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE [illegible]0

TOTAL INCOME ($ Millions)
5 Medium Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.97	2.24	2.69	2.91	3.51	3.76	4.36	4.70	5.47	6.17	Growth Rate: Standard Deviation:	13.29% .16
Dollars Deflated By Implicit GNP Deflator	1.97	2.13	2.44	2.53	2.83	2.74	2.97	3.04	3.33	3.45	Growth Rate: Standard Deviation:	6.06% .21
Dollars Deflated By Consumer Price Index	1.97	2.13	2.47	2.57	2.84	2.74	2.97	3.02	3.30	3.40	Growth Rate: Standard Deviation:	5.85% .23

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-31

TOTAL EXPENSES ($ Million)
5 Medium Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	2.23	2.54	2.70	2.81	3.70	3.92	4.48	4.81	5.59	6.15	Growth Rate: Standard Deviation:	12.20% .24
Dollars Deflated By Implicit GNP Deflator	2.23	2.42	2.45	2.44	2.98	2.85	3.05	3.11	3.40	3.44	Growth Rate: Standard Deviation:	5.05% .21
Dollars Deflated By Consumer Price Index	2.23	2.42	2.48	2.48	2.99	2.85	3.05	3.10	3.37	3.39	Growth Rate: Standard Deviation:	4.83% .20

Data deflated using indicies readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE [illegible]2

SURPLUS/(DEFICIT) ($Thousands)
5 Medium Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	-257	-300	-13	102	-186	-152	-120	-112	-118	18
Dollars Deflated By Implicit GNP Deflator	-257	-285	-12	88	-150	-111	-82	-73	-72	10
Dollars Deflated By Consumer Price Index	-257	-285	-12	90	-151	-111	-82	-72	-71	10

Data deflated using indices readjusted to FY70 as the base.

Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-33

EARNINGS GAP ($ Millions)
5 Medium Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	1.05	1.29	1.42	1.35	2.04	2.15	2.55	2.55	2.76	2.76	Growth Rate: 12.15% Standard Deviation: .57
Dollars Deflated By Implicit GNP Deflator	1.05	1.23	1.29	1.17	1.65	1.56	1.73	1.65	1.68	1.55	Growth Rate: 5.00% Standard Deviation: .54
Dollars Deflated By Consumer Price Index	1.05	1.23	1.30	1.19	1.65	1.57	1.73	1.64	1.66	1.52	Growth Rate: 4.79% Standard Deviation: .54

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE [illegible]

EARNED INCOME ($ Millions)
4 Large Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.21	1.38	1.57	1.54	1.76	2.06	2.41	2.98	3.85	3.99	Growth Rate: Standard Deviation:	14.69% .48
Dollars Deflated By Implicit GNP Deflator	1.21	1.31	1.42	1.34	1.42	1.49	1.64	1.93	2.34	2.23	Growth Rate: Standard Deviation:	7.38% .43
Dollars Deflated By Consumer Price Index	1.21	1.31	1.44	1.36	1.42	1.50	1.64	1.92	2.32	2.20	Growth Rate: Standard Deviation:	7.16% .41

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

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TABLE 7-35

GOVERNMENT SUPPORT ($ Millions)
4 Large Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.57	.54	.68	.90	.97	1.33	1.00	.94	1.21	1.33	Growth Rate: Standard Deviation:	9.84% .88
Dollars Deflated By Implicit GNP Deflator	.57	.52	.62	.78	.78	.96	.68	.61	.73	.74	Growth Rate: Standard Deviation:	2.84% .85
Dollars Deflated By Consumer Price Index	.57	.52	.63	.80	.79	.97	.68	.61	.73	.73	Growth Rate: Standard Deviation:	2.64% .87

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7- 36

PRIVATE SUPPORT ($ Millions)
4 Large Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.087	.15	.13	.22	.28	.52	.56	.56	.78	.74	Growth Rate: Standard Deviation:	28.55% 1.33
Dollars Deflated By Implicit GNP Deflator	.087	.15	.12	.19	.23	.38	.38	.37	.48	.42	Growth Rate: Standard Deviation:	20.39% 1.24
Dollars Deflated By Consumer Price Index	.087	.15	.12	.20	.23	.38	.38	.36	.47	.41	Growth Rate: Standard Deviation:	20.14% 1.25

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-37

TOTAL SUPPORT ($ Millions)
4 Large Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.65	.70	.81	1.13	1.25	1.84	1.56	1.51	1.99	2.07	Growth Rate: Standard Deviation:	14.38% .80
Dollars Deflated By Implicit GNP Deflator	.65	.66	.74	.98	1.01	1.34	1.06	.98	1.21	1.16	Growth Rate: Standard Deviation:	7.09% .76
Dollars Deflated By Consumer Price Index	.65	.66	.74	.99	1.01	1.34	1.06	.97	1.20	1.14	Growth Rate: Standard Deviation:	6.87 .79

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE [illegible]8

TOTAL INCOME ($ Millions)
4 Large Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	1.87	2.08	2.38	2.67	3.01	3.90	3.96	4.49	5.84	6.06	Growth Rate: 14.58% Standard Deviation: .27
Dollars Deflated By Implicit GNP Deflator	1.87	1.97	2.16	2.31	2.43	2.83	2.70	2.91	3.55	3.39	Growth Rate: 7.28% Standard Deviation: .24
Dollars Deflated By Consumer Price Index	1.87	1.97	2.18	2.35	2.44	2.84	2.70	2.89	3.52	3.34	Growth Rate: 7.06% Standard Deviation: .25

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-39

TOTAL EXPENSES ($ Millions)
4 Large Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	1.93	2.14	2.34	2.68	3.05	3.81	3.99	4.67	5.83	6.30	Growth Rate: 14.65% Standard Deviation: .23
Dollars Deflated By Implicit GNP Deflator	1.93	2.03	2.13	2.33	2.46	2.77	2.72	3.03	3.55	3.53	Growth Rate: 7.34% Standard Deviation: .19
Dollars Deflated By Consumer Price Index	1.93	2.04	2.15	2.37	2.47	2.78	2.72	3.01	3.52	3.47	Growth Rate: 7.12% Standard Deviation: .18

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE [illegible]

SURPLUS/(DEFICIT) ($ Thousands)
4 Large Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	-63	-65	38	-16	-40	88	-28	-188	37	-242
Dollars Deflated By Implicit GNP Deflator	-63	-62	35	-14	-32	64	-19	-122	23	-135
Dollars Deflated By Consumer Price Index	-63	-62	35	-14	-32	64	-19	-121	22	-135

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-41

EARNINGS GAP ($ Millions)
4 Large Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.72	.76	.78	1.14	1.29	1.75	1.59	1.70	1.98	2.32	Growth Rate: Standard Deviation:	14.58% .63
Dollars Deflated By Implicit GNP Deflator	.72	.73	.70	.99	1.04	1.28	1.08	1.10	1.21	1.30	Growth Rate: Standard Deviation:	7.28% .59
Dollars Deflated By Consumer Price Index	.72	.73	.71	1.01	1.04	1.28	1.08	1.09	1.20	1.28	Growth Rate: Standard Deviation:	7.06% .61

Data deflated using indices readjusted to FY70 as the base
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE [illegible]

EARNED INCOME ($ Millions)

6 Jumbo Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	4.43	4.51	4.75	6.31	7.64	9.03	10.29	11.37	12.98	18.10	Growth Rate: Standard Deviation:	17.11% .45
Dollars Deflated By Implicit GNP Deflator	4.43	4.29	4.32	5.47	6.15	6.57	7.01	7.37	7.90	10.12	Growth Rate: Standard Deviation:	9.64% .38
Dollars Deflated By Consumer Price Index	4.43	4.29	4.36	5.57	6.13	6.58	7.01	7.32	7.83	9.98	Growth Rate: Standard Deviation:	9.42% .37

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-43

PRIVATE SUPPORT ($ Millions)

6 Jumbo Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	2.42	2.25	2.19	2.68	2.52	3.04	2.96	3.20	3.58	4.10	Growth Rate: Standard Deviation:	6.49% .39
Dollars Deflated By Implicit GNP Deflator	2.42	2.14	1.99	2.33	2.03	2.21	2.02	2.07	2.18	2.29	Growth Rate: Standard Deviation:	-.29% .33
Dollars Deflated By Consumer Price Index	2.42	2.14	2.00	2.37	2.04	2.22	2.01	2.06	2.16	2.26	Growth Rate: Standard Deviation:	-.50% .33

Data deflated using indices readjusted to FY70 as the base
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE

GOVERNMENT SUPPORT ($ Millions)
6 Jumbo Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.38	.49	.58	.76	1.01	1.33	1.48	1.74	1.92	2.88	Growth Rate: Standard Deviation:	24.13% .49
Dollars Deflated By Implicit GNP Deflator	.38	.45	.53	.66	.82	.97	1.01	1.13	1.17	1.61	Growth Rate: Standard Deviation:	16.22% .46
Dollars Deflated By Consumer Price Index	.38	.46	.53	.67	.82	.97	1.01	1.1[illegible]	1.16	1.59	Growth Rate: Standard Deviation:	15.97% .48

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-45

TOTAL SUPPORT ($ Millions)
6 Jumbo Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	2.80	2.73	2.77	3.45	3.54	4.38	4.40	4.94	5.50	6.97	Growth Rate: Standard Deviation:	10.83% .40
Dollars Deflated By Implicit GNP Deflator	2.80	2.59	2.51	2.99	2.85	3.18	3.00	3.20	3.35	3.90	Growth Rate: Standard Deviation:	3.76% .33
Dollars Deflated By Consumer Price Index	2.80	2.59	2.54	3.04	2.86	3.19	3.00	3.18	3.32	3.84	Growth Rate: Standard Deviation:	3.55% .32

Data deflated using indices readjusted to FY70 as the base
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE

TOTAL INCOME ($ Millions)
6 Jumbo Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	7.23	7.24	7.52	9.76	11.17	13.40	14.69	16.31	18.48	25.07	Growth Rate: 14.98% Standard Deviation: .42
Dollars Deflated By Implicit GNP Deflator	7.23	6.88	6.83	8.46	9.00	9.75	10.01	10.57	11.25	14.02	Growth Rate: 7.65% Standard Deviation: .35
Dollars Deflated By Consumer Price Index	7.23	6.89	6.90	8.61	9.05	9.77	10.00	10.50	11.15	13.82	Growth Rate: 7.43% Standard Deviation: .34

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-47

TOTAL EXPENSES ($ Millions)
6 Jumbo Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	7.33	6.95	7.05	9.61	11.17	13.00	14.63	17.00	18.48	24.08	Growth Rate: 15.21% Standard Deviation: .48
Dollars Deflated By Implicit GNP Deflator	7.33	6.61	6.41	8.34	9.00	9.45	9.97	11.01	11.25	13.47	Growth Rate: 7.86% Standard Deviation: .41
Dollars Deflated By Consumer Price Index	7.33	6.61	6.47	8.49	9.04	9.48	9.96	10.94	11.15	13.27	Growth Rate: 7.64% Standard Deviation: .40

Data deflated using indices readjusted to FY70 as the base
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE [illegible]

SURPLUS/(DEFICIT) ($ Thousands)
6 Jumbo Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	-104	290	469	145	5	410	57	-690	-.5	990
Dollars Deflated By Implicit GNP Deflator	-104	276	426	126	4	298	39	-447	-.3	554
Dollars Deflated By Consumer Price Index	-104	276	430	129	4	299	39	-444	-.3	546

Data deflated using indices readjusted to FY70 as the base.
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE 7-49

EARNINGS GAP ($ Millions)
6 Jumbo Theaters

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	2.90	2.44	2.30	3.30	3.53	3.97	4.35	5.63	5.50	5.98	Growth Rate: 11.27 Standard Deviation: .66
Dollars Deflated By Implicit GNP Deflator	2.90	2.32	2.09	2.86	2.85	2.88	2.96	3.65	3.35	3.34	Growth Rate: 4.18 Standard Deviation: .59
Dollars Deflated By Consumer Price Index	2.90	2.32	2.11	2.92	2.86	2.89	2.96	3.62	3.32	3.30	Growth Rate: 3.96 Standard Deviation: .59

Data deflated using indices readjusted to FY70 as the base
Source of Data: The Ford Foundation and Theatre Communications Group

TABLE [illegible]

INCOME FROM TICKET SALES AND PERFORMANCE FEES ($ Millions)
29 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	15.54	17.10	19.26	22.67	27.03	Growth Rate: Standard Deviation:	14.89% .50
Dollars Deflated By Consumer Price Index	11.33	11.64	12.40	13.67	14.90	Growth Rate: Standard Deviation:	7.33% .38

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-51

TOTAL PERFORMANCE INCOME* ($ Millions)
29 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	16.11	17.88	20.38	23.58	28.34	Growth Rate: Standard Deviation:	15.09% .43
Dollars Deflated By Consumer Price Index	11.75	12.18	13.12	14.22	15.62	Growth Rate: Standard Deviation:	7.52% .28

*Includes "Grants with Services Required".

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-52

INCOME FROM BOOKED-IN EVENTS* ($ Millions)
29 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.24	1.16	1.16	1.58	2.21	Growth Rate: Standard Deviation:	15.73% 2.77
Dollars Deflated By Consumer Price Index	.90	.79	.75	.95	1.22	Growth Rate: Standard Deviation:	8.12% 2.47

*Performances not produced by the Theater, but held in the Theater's space.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-53

TOTAL EARNED INCOME* ($ Millions)
29 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	18.53	20.22	22.85	27.10	33.39	Growth Rate: Standard Deviation:	15.84% .72
Dollars Deflated By Consumer Price Index	13.51	13.77	14.70	16.34	18.41	Growth Rate: Standard Deviation:	8.21% .55

*Excludes "Grants with Services Required".

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-54

CONTRIBUTIONS FROM INDIVIDUALS ($ Millions)
29 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	2.44	2.09	2.27	2.70	2.64	Growth Rate: Standard Deviation:	4.21% 1.38
Dollars Deflated By Consumer Price Index	1.78	1.42	1.46	1.63	1.46	Growth Rate: Standard Deviation:	-2.65% 1.31

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-55

CONTRIBUTIONS FROM BUSINESS ($ Millions)
29 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.55	.56	.72	1.04	1.30	Growth Rate: Standard Deviation:	26.09% 1.86
Dollars Deflated By Consumer Price Index	.40	.38	.47	.63	.72	Growth Rate: Standard Deviation:	17.80% 1.72

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-56

GRANTS AND CONTRIBUTIONS FROM FOUNDATIONS* ($ Millions)
29 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	2.23	2.58	2.24	1.98	2.32	Growth Rate: Standard Deviation:	-1.83% 1.41
Dollars Deflated By Consumer Price Index	1.63	1.76	1.44	1.20	1.28	Growth Rate: Standard Deviation:	-8.29% 1.23

*Does not include "Grants with Services Required" which was under $50,000 in all years except 1979, in which it was $190,000.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-57

TOTAL PRIVATE SUPPORT* ($ Millions)
29 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	7.99	7.97	8.43	9.78	10.71	Growth Rate: Standard Deviation:	8.21% .74
Dollars Deflated By Consumer Price Index	5.83	5.43	5.42	5.90	5.90	Growth Rate: Standard Deviation:	1.09% .65

*Includes "Grants with Services Required" which ranges from about $175,000 in 1975 to $400,000 in 1979.
Data deflated using indices reedjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-58

GRANTS FROM LOCAL GOVERNMENT* ($ Millions)
29 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.26	.40	.35	.61	.60	Growth Rate:	22.89%
						Standard Deviation:	2.94
Dollars Deflated By Consumer Price Index	.19	.28	.23	.37	.33	Growth Rate:	14.80%
						Standard Deviation:	2.77

*Does not include "Grants with Services Required".
Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-59

GRANTS FROM STATE GOVERNMENT* ($ Millions)
29 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.20	1.05	1.01	1.27	1.46	Growth Rate:	6.14%
						Standard Deviation:	1.95
Dollars Deflated By Consumer Price Index	.87	.71	.65	.77	.81	Growth Rate:	-.84%
						Standard Deviation:	1.74

*Does not include "Grants with Services Required".

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-60

GRANTS FROM THE FEDERAL GOVERNMENT* ($ Millions)
29 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	2.11	2.09	2.18	3.19	3.73	Growth Rate: Standard Deviation:	16.97% 2.08
Dollars Deflated By Consumer Price Index	1.54	1.42	1.40	1.92	2.06	Growth Rate: Standard Deviation:	9.27% 1.89

*Does not include "Grants with Services Required".
Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-61

TOTAL GOVERNMENT SUPPORT* ($ Millions)
29 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	3.88	4.04	4.47	5.33	6.61	Growth Rate: Standard Deviation:	14.33% 1.04
Dollars Deflated By Consumer Price Index	2.83	2.75	2.87	3.21	3.64	Growth Rate: Standard Deviation:	6.81% .87

*Includes "Grants with Services Required" which ranges from $320,000 in 1975 to $805,000 in 1979.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-62

TOTAL SUPPORT INCOME* ($ Millions)
29 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	11.88	12.01	12.89	15.11	17.31	Growth Rate: Standard Deviation:	10.33% .83
Dollars Deflated By Consumer Price Index	8.66	8.18	8.30	9.11	9.54	Growth Rate: Standard Deviation:	3.07% .71

*Includes "Grants with Services Required" - See Tables 11-57 and 11-61.
Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-63

TOTAL INCOME ($ Millions)
29 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	30.41	32.23	35.74	42.21	50.70	Growth Rate: Standard Deviation:	13.78% .76
Dollars Deflated By Consumer Price Index	22.17	21.94	23.00	25.46	27.95	Growth Rate: Standard Deviation:	6.31% .62

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-64

TOTAL EXPENSES ($ Millions)
29 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	30.05	32.89	36.92	42.84	50.28	Growth Rate: Standard Deviation:	13.81% .42
Dollars Deflated By Consumer Price Index	21.91	22.40	23.76	25.84	27.72	Growth Rate: Standard Deviation:	6.33% .31

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-65

OPERATING SURPLUS/(DEFICIT) ($ THOUSANDS)
29 Theaters

	FY75	FY76	FY77	FY78	FY79
Actual Dollars	361	-664	-1,183	-633	415
Dollars Deflated By Consumer Price Index	263	-452	-761	-382	229

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-66

EARNINGS GAP ($ Millions)
29 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	11.52	12.67	14.08	15.75	16.89	Growth Rate: Standard Deviation:	10.34% .17
Dollars Deflated By Consumer Price Index	8.40	8.63	9.06	9.50	9.31	Growth Rate: Standard Deviation:	3.08% .31

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-67

EARNED INCOME ($ Millions)
11 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	4.41	4.92	5.53	6.55	6.85	Growth Rate: Standard Deviation:	12.38% .48
Dollars Deflated By Consumer Price Index	3.22	3.35	3.56	3.95	3.77	Growth Rate: Standard Deviation:	4.98% .58

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-68

PRIVATE SUPPORT ($ Millions)
11 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.72	1.88	2.05	2.70	2.82	Growth Rate: Standard Deviation:	14.07% .38
Dollars Deflated By Consumer Price Index	1.26	1.28	1.32	1.64	1.56	Growth Rate: Standard Deviation:	7.01% .42

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-69

GOVERNMENT SUPPORT ($ Millions)
11 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.93	.98	1.13	1.65	1.71	Growth Rate: Standard Deviation:	19.09% 1.62
Dollars Deflated By Consumer Price Index	.68	.67	.73	1.00	.94	Growth Rate: Standard Deviation:	11.25% 1.56

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-70

TOTAL SUPPORT ($ Millions)
11 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	2.65	2.86	3.18	4.35	4.53	Growth Rate: Standard Deviation:	17.06% 1.04
Dollars Deflated By Consumer Price Index	1.93	1.95	2.05	2.57	2.63	Growth Rate: Standard Deviation:	9.36% .97

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-71

TOTAL INCOME ($ Millions)
11 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	7.06	7.78	8.71	10.91	11.38	Growth Rate: Standard Deviation:	13.80% .70
Dollars Deflated By Consumer Price Index	5.15	5.30	5.61	6.58	6.27	Growth Rate: Standard Deviation:	6.31% .75

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-72

TOTAL EXPENSES ($ Millions)
11 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	7.01	7.98	9.01	11.34	11.92	Growth Rate: Standard Deviation:	15.18% .68
Dollars Deflated By Consumer Price Index	5.11	5.43	5.80	6.84	6.57	Growth Rate: Standard Deviation:	7.60% .74

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-73

SURPLUS/(DEFICIT) ($ Thousands)
11 Theaters

	FY75	FY76	FY77	FY78	FY79
Actual Dollars	50	-198	-296	-434	-538
Dollars Deflated By Consumer Price Index	36	-135	-191	-262	-297

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

TABLE 7-74

EARNINGS GAP ($ Millions)
11 Theaters

	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	2.60	3.06	3.48	4.79	5.07	Growth Rate: Standard Deviation:	16.08% 1.03
Dollars Deflated By Consumer Price Index	1.90	2.08	2.24	2.80	2.80	Growth Rate: Standard Deviation:	9.01% 1.04

Data deflated using indices readjusted to FY70 as the base.
Source of Data: Theatre Communications Group

CHAPTER 8
DANCE

The organizational entities that make up the dance discipline are ballet and modern dance companies. Although a few companies are over 50 years old, dance is the youngest organizational type of the art forms analyzed in this study, with modern dance being the younger of the two types. This "youth" is reflected in Figure 8-1, which shows the founding years of organizations in three different dance company universes. In line with the previously derived theoretical and empirical results, quicker growth would be expected in this art form.

THE SAMPLE AND THE DATA

To develop a uniform data base over the decade, this study began with the 20 organizations for which the Ford Foundation collected data until 1973-74. One company went out of business during the 70s. For the other 19 companies, financial statements for the second half of the decade were acquired from the National Endowment for the Arts' Dance Program and/or were requested from the companies themselves. Data for all years from 1975 to 1979 were received for 15 companies.

Several problems with the data were found. One organization, New York City Ballet, had to be dropped from most analyses because the only comparable data element reported for the post-Ford Foundation years was its total expenses. The lack of other usable data arose from the presentation of financial data since the Ballet is part of a larger organization, City Center for Drama and Music. The Pittsburgh Ballet, whose data were inaccessible for the initial three years because of its close connection with a local university, was dropped as well. Two other companies, Hartford and Twyla Tharp, also had no data for the first two years but were nevertheless retained in the sample, for both started in 1970. Although the zeros for 1970 and 1971 are not accurate, neither are they materially wrong. Therefore, a sample of eight ballet and five modern dance groups was available, as shown in Figure 8-2.

DANCE COMPANIES - DATES OF FOUNDING

		Dates of Founding			
Data Source*		Pre-1960	1960-69	1970--	Total Number Of Organizations
NEA Dance Touring Program					
Directory FY77		27	64	48	139
(1974-75 Data)	(%)	19.4	46.0	34.5	99.9
AADC Dance Directory		17	52	100	169
1979-80	(%)	10.1	30.8	59.2	100.1
(1977-78 Data)					
National Association of					
Regional Ballet		32	25	26	97**
Member Companies	(%)	33.0	25.8	26.8	100.0
(1979-80 Data)					

*See Chapter 3 for references of data sources.

**Founding dates of 14 are unknown (14.4 percent)

FIGURE 8-1

DANCE COMPANIES IN THE SAMPLE*

Ballet	Size
American Ballet Theatre	Large
Ballet West	Small
Boston Ballet	Small
Hartford Ballet	Small
Houston Ballet	Small
Joffrey Ballet	Large
Pennsylvania Ballet	Large
San Francisco Ballet	Small
Modern Dance	
Alvin Ailey American Dance Theater	Small
Merce Cunningham Dance Company	Small
Martha Graham Dance Company	Small
The Paul Taylor Dance Company	Small
Twyla Tharp Dance Foundation	Small

* New York City Ballet (large) is included in one expense analysis.

Percentage of Total Expenses in 1970 and 1979

	1970	1979
8 Ballet Companies	91%	78%
5 Modern Dance Companies	9%	22%
13 Dance Companies	100%	100%
$ Millions	9.15	32.67

	1970	1979
3 Large Companies	69%	43%
10 Small Companies	31%	57%
13 Dance Companies	100%	100%
$ Millions	9.15	32.67

FIGURE 8-2

Since data for this art form were collected from financial statements, only key summary (total) variables could be extracted, thereby limiting the scope of the analysis. Many subtotals were not consistent from year to year or from organization to organization because of different accounting presentations. For the summary variables, the only major problems arose from companies that had schools. As with theaters, we had to ensure that the organizational entity for the second half of the decade matched the Ford Foundation data. Since we had full fund balance information for 1974 and 1975 from the financial statements (and since most companies that run schools of any substantial size use separate fund accounts), we were able to match the reported entities (see Appendix B for further details).

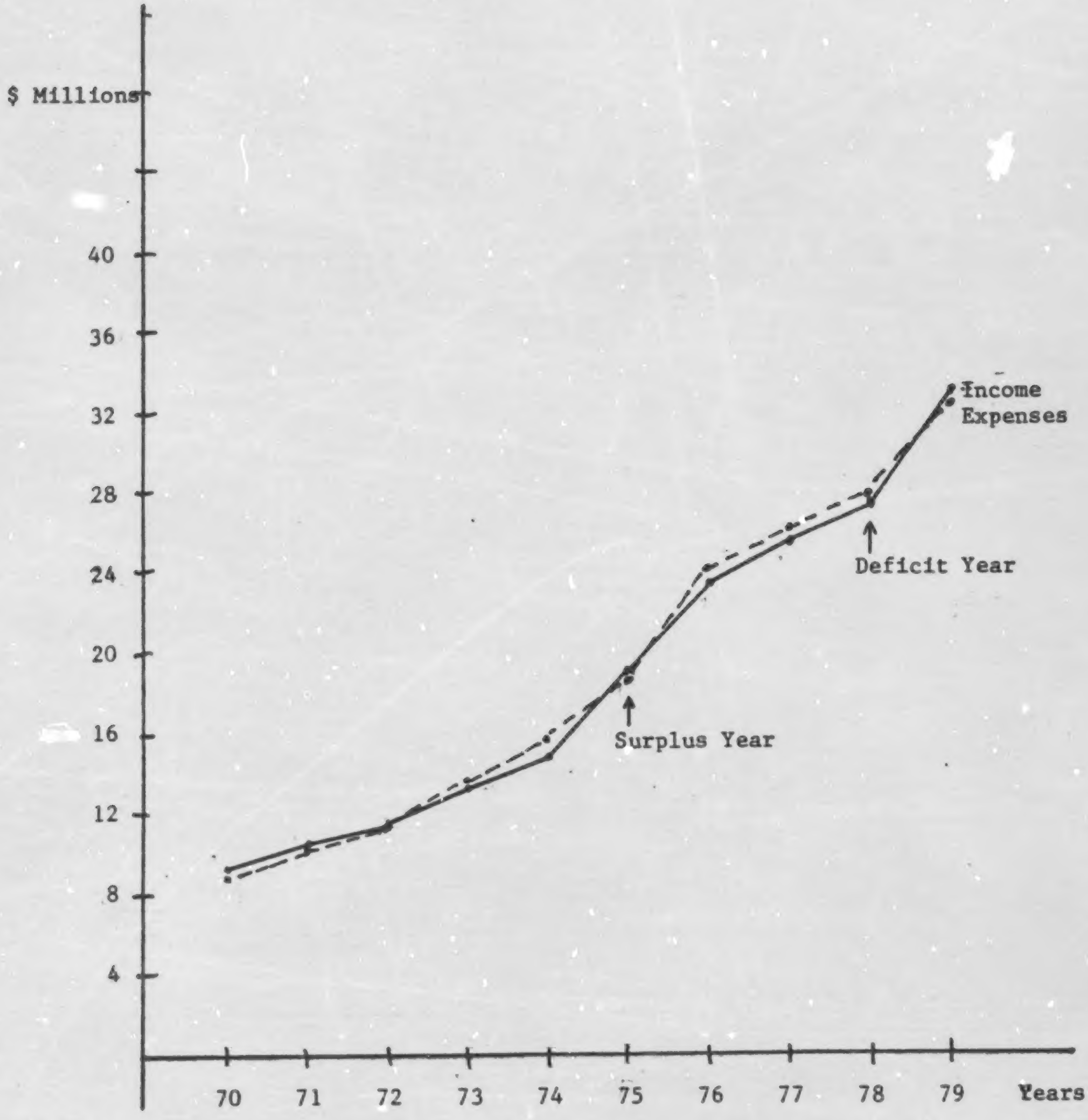
Although the lack of data elements limited the analysis, stratification of the sample broadened the scope. The sample was stratified in two ways: by budget size (companies with budgets of $1 million and over at the beginning of the decade were designated "large," and companies under $1 million were designated "small") and by type of company (ballet or modern dance). Further stratification was meaningless because of the meager size of the sample.

The top portion of Figure 8-2 shows the names of the 13 companies in the sample and their breakdown by budget class and by type. It is clear that all of the larger organizations are ballet groups, while the smaller ones are evenly divided between ballet and modern dance. The bottom portion of Figure 8-2 shows the percentage of total expenses of the entire sample for each subsample.

GROWTH OVER THE DECADE

Figure 8-3 shows total income and total expenses for the sample of 13 dance companies over the decade, the difference between the two lines being the surplus or deficit for each year. (Data for the 13 companies are given in Tables 8-1 through 8-6.) Figure 8-4 shows total expenses and total earned income--the area between is the earnings gap. These figures show the rapid growth of this art form over the decade. Surpluses and deficits just about offset each other, reflecting controlled spending. This is only a partial picture, however, for a dichotomy existed between larger and smaller companies.

TOTAL INCOME AND EXPENSES
(Showing Surplus/(Deficit))
13 DANCE COMPANIES
1970-1979



Source: The Ford Foundation and individual organization financial statements. See Tables 8-3, 8-4, and 8-5.

FIGURE 8-3

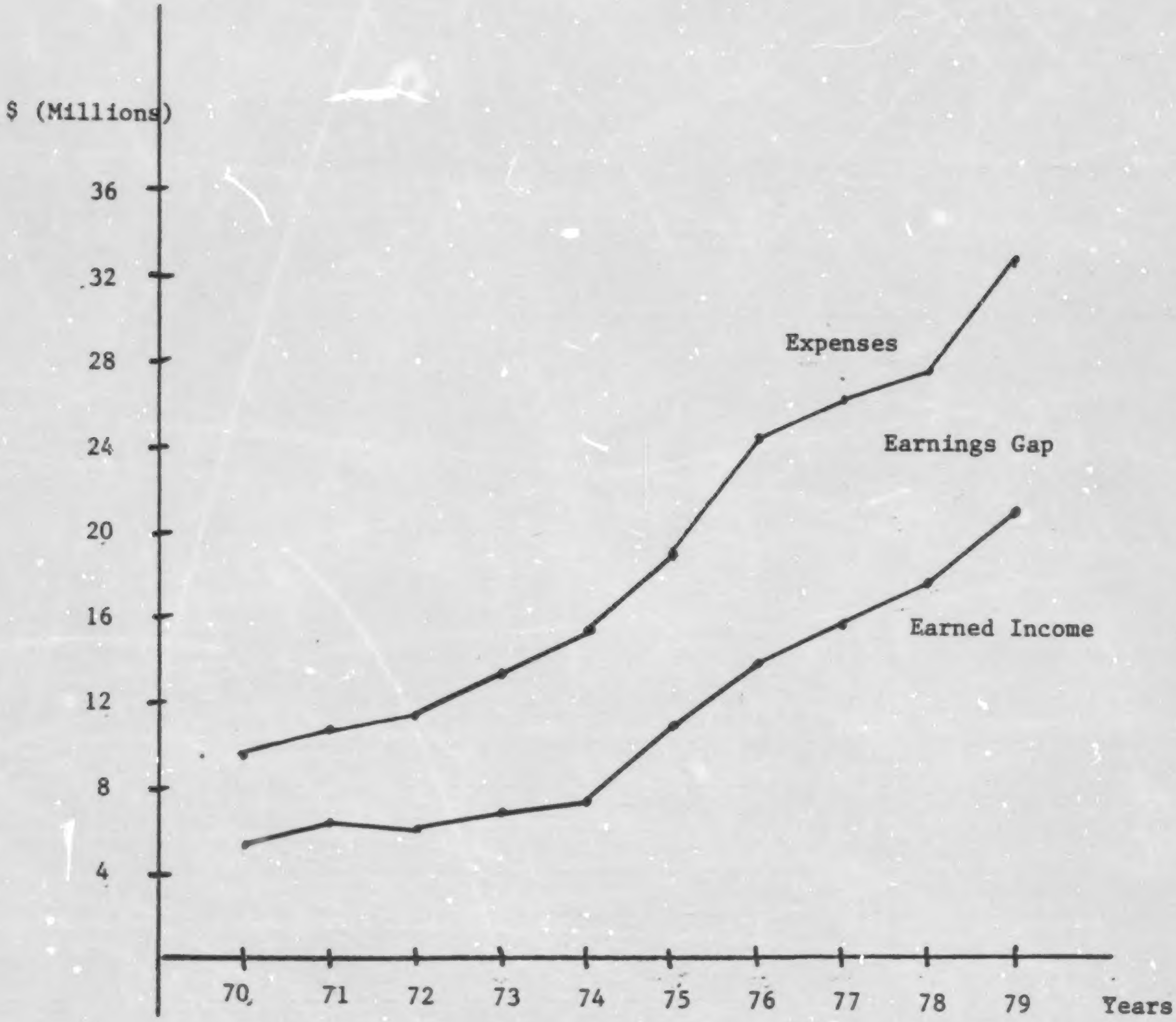
Stratifying the companies in the sample by large (see Tables 8-24 through 8-31) and small (Tables 8-32 through 8-38), as described in Figure 8-2, yields a more complete picture. Figure 8-5 shows income, expenses, and surplus/(deficit) for the 3 larger companies and for the 10 smaller companies, respectively. The two patterns are almost the reverse of one another. While the larger organizations went into the red during the second half of the decade (except the last year), accumulating a total deficit of over $1 million for the decade, the smaller companies as a whole produced continuous, large surpluses for each of the last five years, accumulating a total surplus of over $1 million over the decade.

What is even more surprising is that the large surpluses occurred at the same time that these organizations were growing at an extremely rapid pace (at a 24 percent growth ratefor expenses) the fastest of all art forms. The larger companies grew at a rate that is similar to the other performing art disciplines discussed (about 10 percent). This dichotomy of growth is also reflected in Figure 8-6, which graphs the earnings gap. Both the large and small company groups had a smaller growth in the earnings gap than in expenses, reflecting the greater growth in earned income.

The sample of the larger companies is very limited. When the New York City Ballet is included (the only other company in the large category that existed in 1970), the rate of growth for expenses (the only variable for which we have data) increases from 9.9 to 10.6 percent, still far below the 24 percent growth rate for the smaller companies.

The sample of 13 companies was also stratified by type (ballet or modern dance). Figures 8-7 and 8-8 show the income, expenses, surplus/(deficit), and earnings gap analyses for these groups. Tables 8-7 through 8-14 and 8-16 through 8-23 present the data for ballet and modern dance companies, respectively. Figure 8-9 presents growth rates for the variables for the entire sample of 13 companies and each of the stratified subsamples. Although each subsample contains a very meager number of organizations, the consistency of the results across the samples, as well as with theoretical expectations and the empirical results of the other art forms, leads one to take seriously the implications that can be derived.

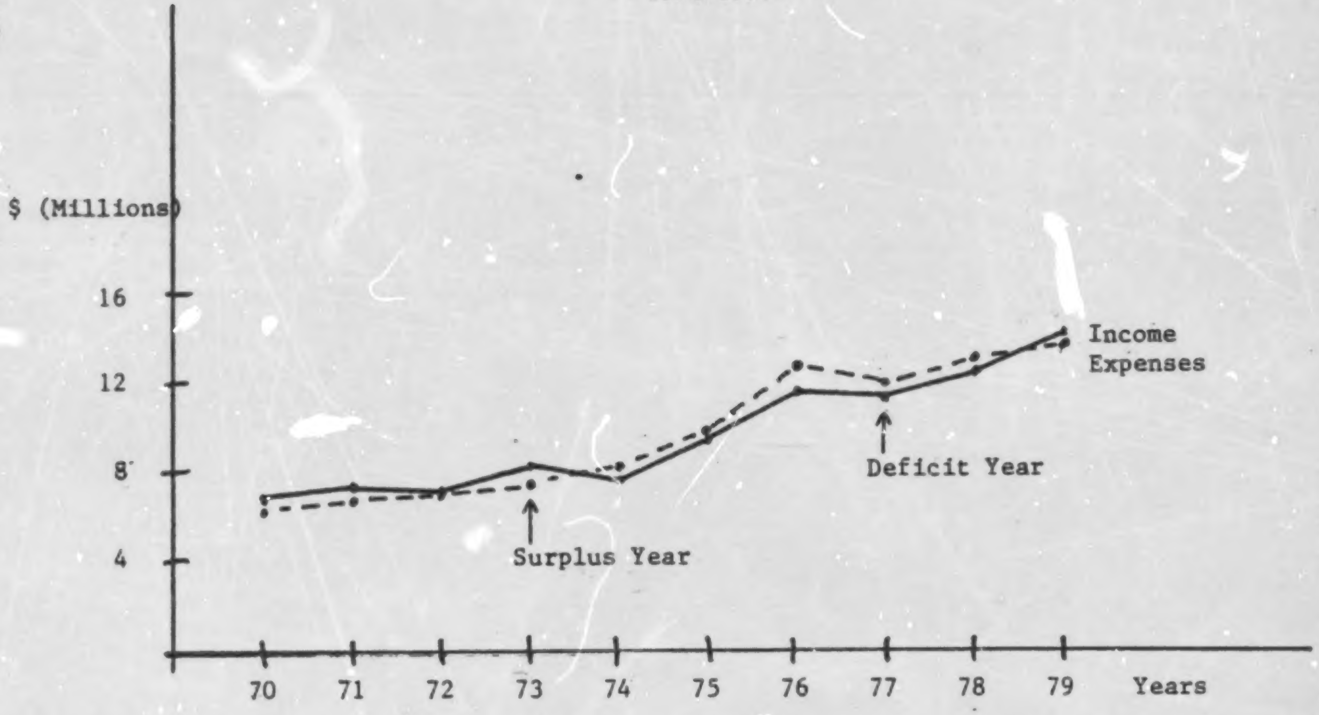
EARNINGS GAP
13 DANCE COMPANIES
1970-1979



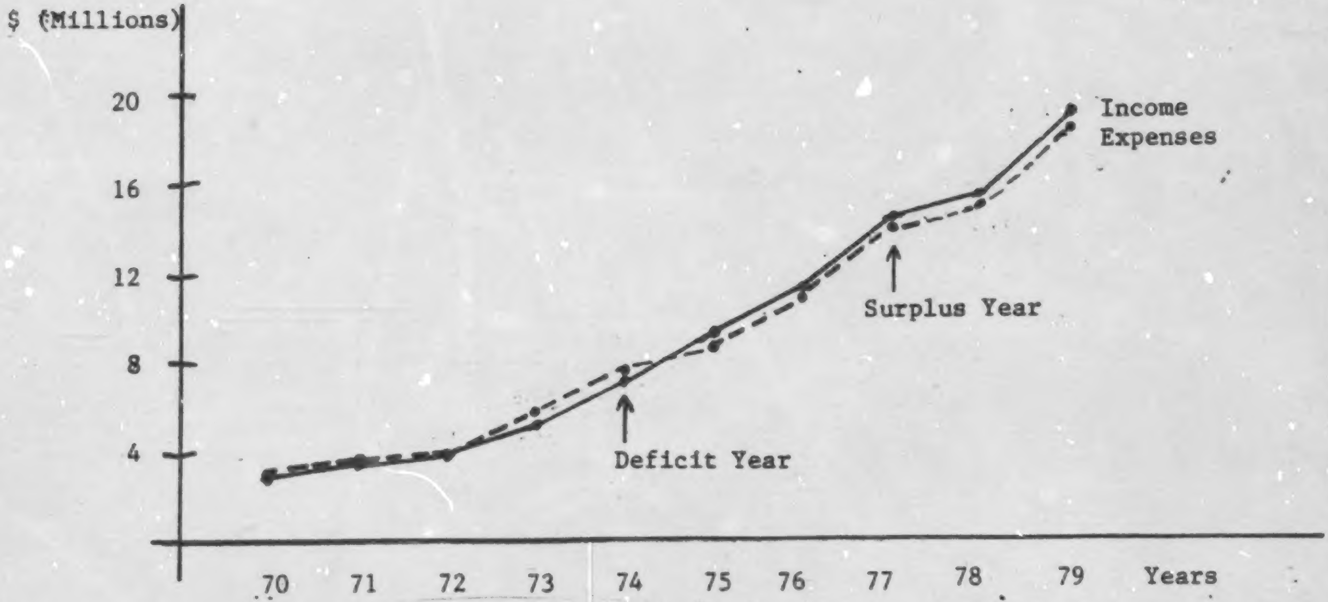
Source: The Ford Foundation and individual organization financial statements. See Tables 8-1, 8-4, and 8-6.

FIGURE 8-4

TOTAL INCOME AND EXPENSES
(Showing Surplus/(Deficit))
1970-1979



3 Larger Dance Companies

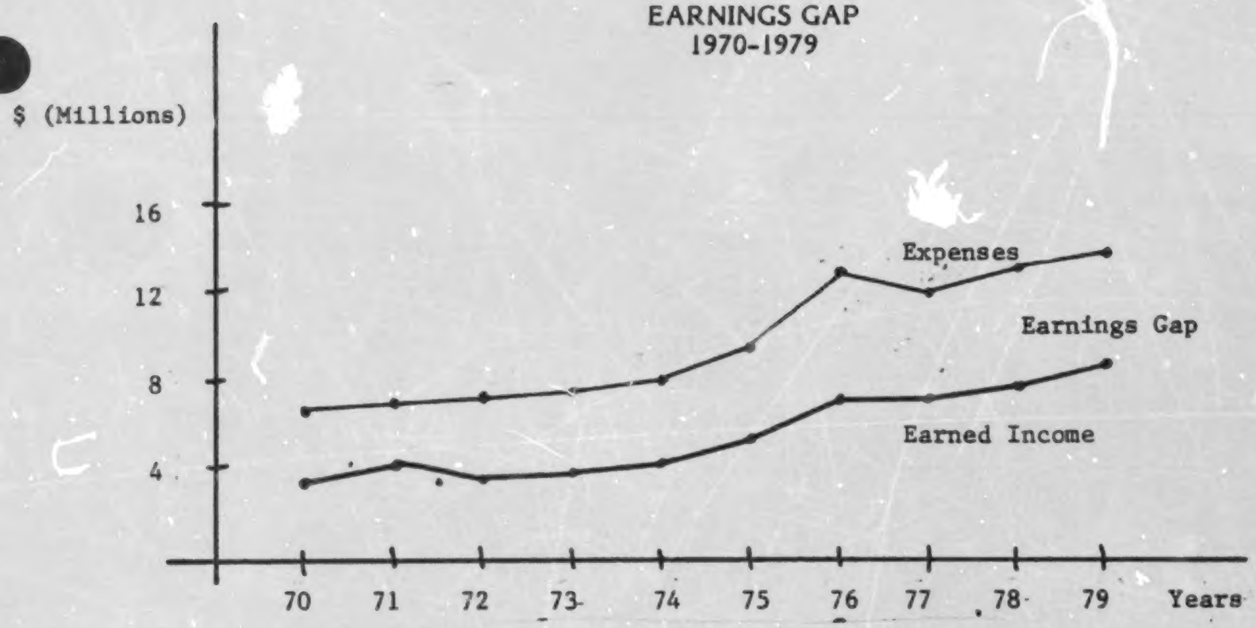


10 Smaller Dance Companies

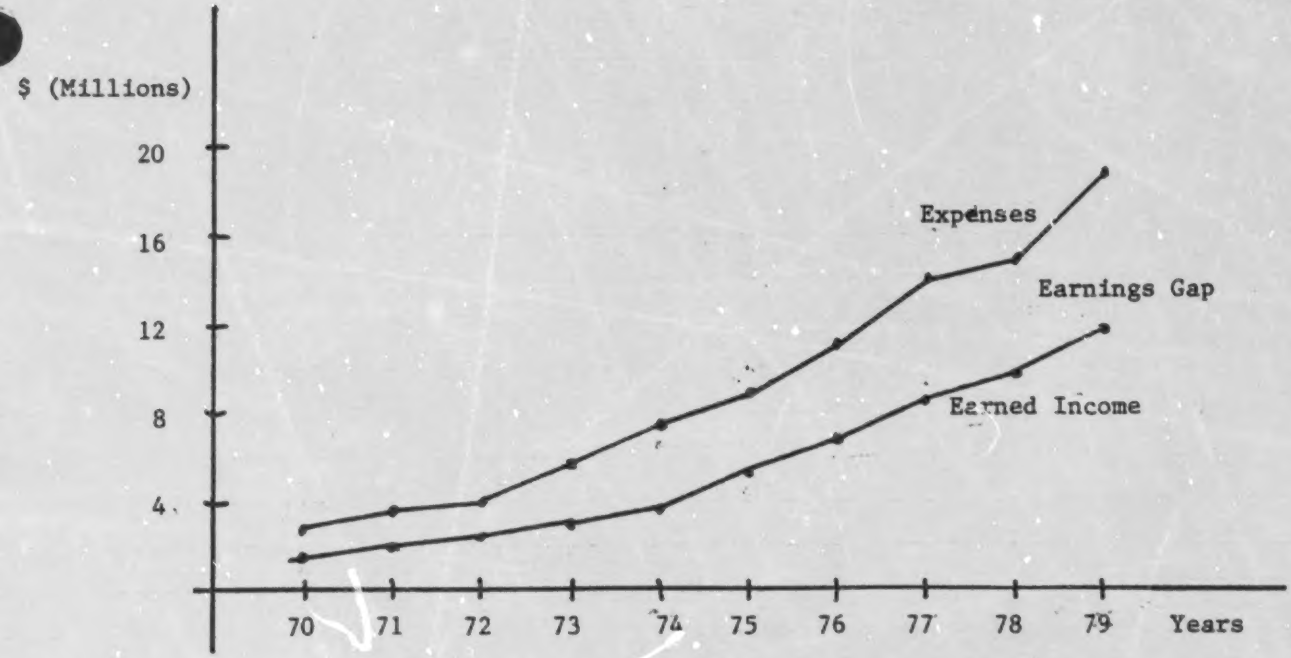
Source: The Ford Foundation and individual organization financial statements. See Tables 8-27, 8-28, 8-29, 8-35, 8-36, and 8-37.

FIGURE 8-5

EARNINGS GAP
1970-1979



3 Larger Dance Companies

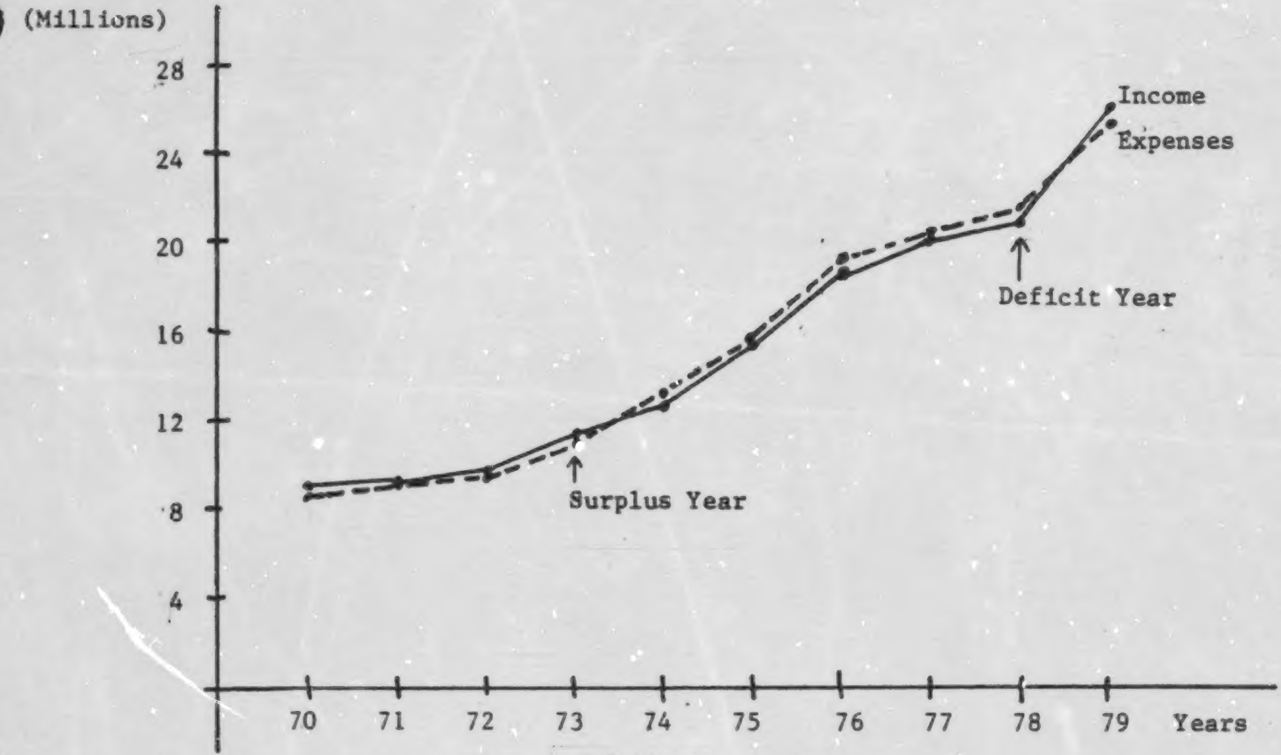


10 Smaller Dance Companies

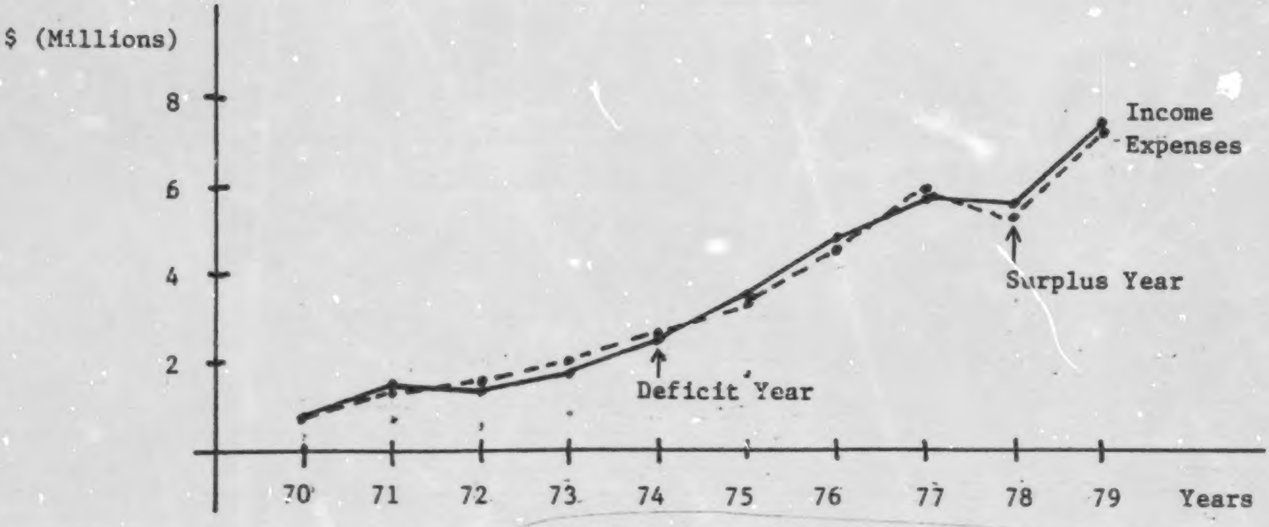
Source: The Ford Foundation and individual organization financial statements. See Tables 8-25, 8-28, 8-30, 8-33, 8-36, and 8-38.

FIGURE 8-6

TOTAL INCOME AND EXPENSES
(Showing Surplus/(Deficit))
1970-1979



8 Ballet Companies

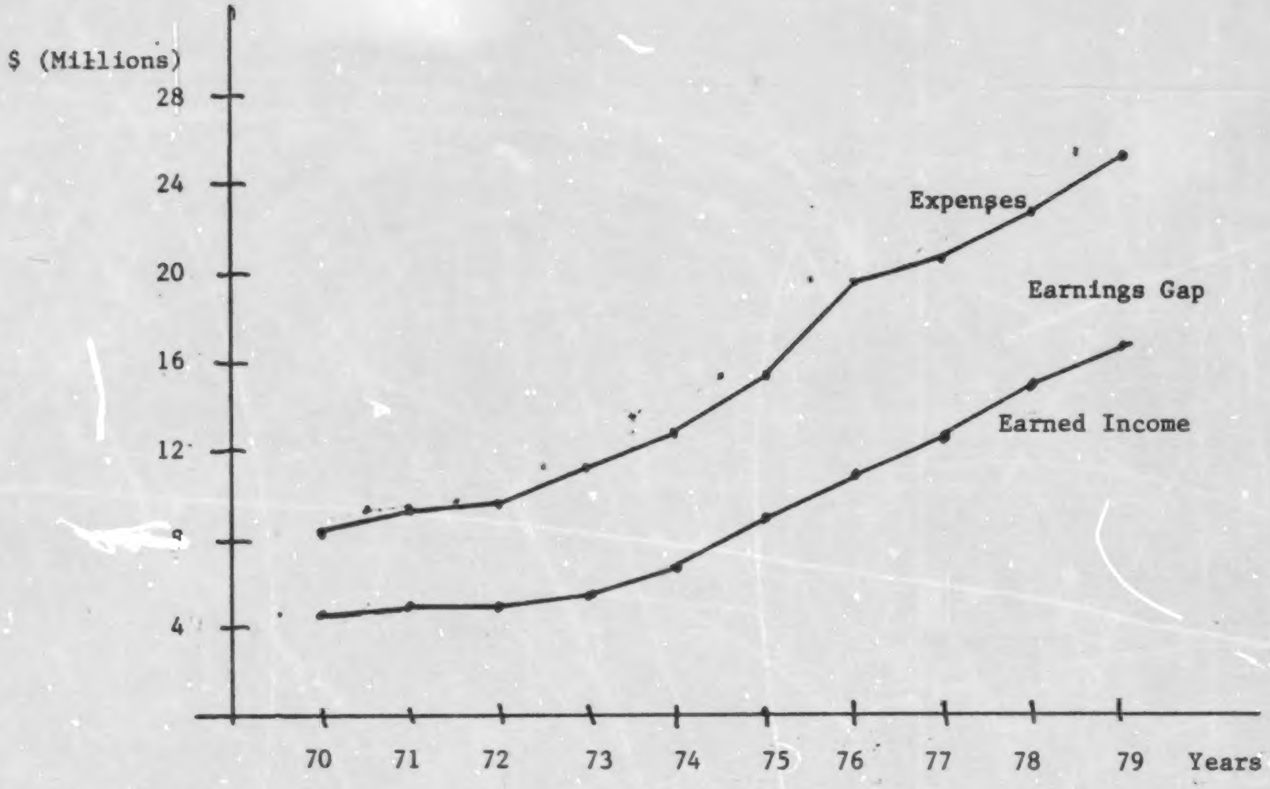


5 Modern Dance Companies

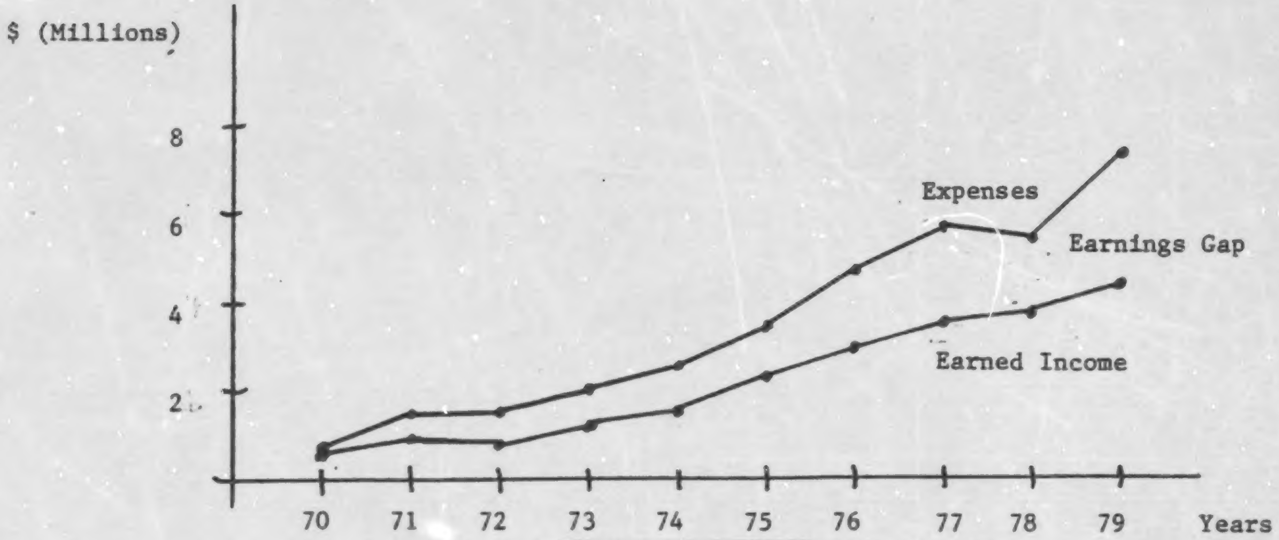
Source: The Ford Foundation and individual organization financial statements. See Tables 8-10, 8-11, 8-12, 8-19, 8-20, and 8-21.

FIGURE 8-7

EARNINGS GAP
1970-1979



8 Ballet Companies



5 Modern Dance Companies

Source: The Ford Foundation and individual organization financial statements. See Tables 8-8, 8-11, 8-13, 8-17, 8-20, and 8-22.

FIGURE 8-8

GROWTH RATES OF GROUPS OF DANCE COMPANIES
1970-1979

Economic Variables	13 Dance Companies	8 Ballet Companies	5 Modern Dance Companies	3 Large Dance Companies	10 Small Dance Companies
Performance	NA	16.2[1]	24.6	11.1	27.1
Income		8.5[2]	16.4	3.7	18.7
Earned	18.4	16.4	24.4	11.1	26.7
Income	10.7	8.7	16.2	3.8	18.4
Support	12.9	9.8	31.9	5.3	22.5
Income	5.4	2.6	23.3	-1.63	14.5
Total	16.1	13.5	26.5	8.6	25.0
Income	8.5	6.0	18.2	1.47	16.8
Total	16.5	14.1	26.0	9.9	24.0
Expenses	8.9	6.6	17.7	2.7	15.9
Earnings	13.8	11.0	30.8	8.3	20.2
Gap	6.4	3.7	22.2	0.5	12.3

[1] Growth rate in actual dollars.

[2] Growth rate in deflated dollars (using Consumer Price Index).

FIGURE 8-9

The following conclusions can be derived from Figure 8-9 in conjunction with other data presented in this chapter.

(1) The subsample of large companies (with or without the New York City Ballet), which contained only ballet companies, behaved very much like the set of 17 Major orchestras, except for the slow growth of support income. As a result, support income decreased as a fraction of total income over the decade. Support and earned income both for the sample of eight ballet companies and for the sample of three larger dance (ballet) companies started the decade at about equal levels. Growth of earned income far outpaced support income, changing the balance, as shown in Figure 8-10. Most of earned income comes from performance income (i.e., tickets sales and fees). Although we lack data on attendance and on capacity, a guess could be made that the ballet companies were drawing greater audiences at the end of the decade than at the beginning.

(2) For the larger companies, expenses grew faster than income, creating the accumulation of deficits. The consistent, large deficits during the latter half of the decade (except the last year) raise the question whether other funds (e.g., endowment) filled the deficit. Because the data base was built from financial statements, data on transfers are available. The three larger companies transferred almost $2 million into their operating funds between 1971 and 1978, and in 1979 they transferred out over $600,000, with the result that over the decade, $1.3 million was transferred in to cover deficits (yearly or accumulated). Dance companies are not as well endowed as orchestras, opera companies, or museums. They did have school funds and cash reserve funds from which the transfers came.

(3) While the larger companies grew at the relatively slow pace of about 10 percent, the subsample of smaller organizations grew the fastest of any art form in the study. Earned income grew much faster than expenses, resulting in a slower earnings gap growth. Although expenses grew at a

skyrocketing pace of 24 percent, a surplus was nevertheless accumulated over the decade. Figure 8-9 shows that support income grew at 22.5 percent versus the slower growth of the earnings gap of 20.2 percent.

(4) A comparison of column 2 in Figure 8-9 (8 ballet companies) with column 4 (large dance companies--all ballet), implies that the small ballet groups grew at a much faster rate than did the large ballet organizations. A similar comparison of column 3 (5 modern dance companies) with column 5 (10 small dance companies, including both modern dance and small ballet), implies that the modern dance groups grew faster than the small ballet organizations.

(5) For the subsample of modern dance companies, the support income outpaced earned income and as a component of total income, changed over the decade (see Figure 8-10). This rapid growth of support income came from both government and private support as shown in Figure 8-11. (For these five companies, the financial statements appear to have clearly segregated government and private sources of support income, thereby providing usable data.)

As with the other performing arts, there were several sources of external funding designed to focus on a long-term solution to deficits by lifting the organizations to a new level of financial stability. These had a major impact on the management of the dance companies specifically with regard to the surplus/(deficit). Early in the decade, there was the Ford Foundation Cash Reserve program, then Mellon Foundation (both described in Chapter 6 on operas) programs for ballet and modern dance. The end of the decade introduced the NEA Challenge Grant program (described in Chapter 5 on orchestras). Most of these grants were specifically to remove present or accumulated deficits.

But what is even more noteworthy in the case of dance is the relative size of the grants. The entire sample of 13 dance companies received a total of $3.22 million in Challenge Grants; $2.64 million for 7 of the 8 ballet companies ($1.68 million of which went to the three large companies) and $.58 million

COMPONENTS OF TOTAL INCOME: $ (MILLIONS) AND PERCENTAGES
4 GROUPS OF DANCE COMPANIES
1970 and 1979

	1970		1979	
	Total $ (Millions)	%	Total $ (Millions)	%
8 Ballet Companies				
Performance Income*	4.25	48	14.74	57
Earned Income	4.57	52	16.34	63
Support Income	4.24	48	9.70	37
Total Income	8.81	100	26.04	100
5 Modern Dance Companies				
Performance Income*	.59	68	3.70	50
Earned Income	.71	82	4.32	59
Support Income	.16	18	5.07	41
Total Income	.87	100	7.38	100
3 Larger Dance Companies				
Performance Income*	3.49	51	8.11	57
Earned Income	3.68	53	8.69	61
Support Income	3.21	47	5.49	39
Total Income	6.89	100	14.18	100
10 Smaller Dance Companies				
Performance Income*	1.35	48	10.34	54
Earned Income	1.60	57	11.96	62
Support Income	1.20	43	7.27	38
Total Income	2.80	100	19.23	100

*Performance income is a major portion of earned income.

FIGURE 8-10

COMPONENTS OF SUPPORT INCOME $ (MILLIONS)
5 MODERN DANCE COMPANIES
1970-1979

	1970	1971	1972	1973	1974	1975	1976	1977	1978	1979
Private Support	.14	.14	.16	.23	.43	.66	1.25	1.31	.94	1.58
Government Support	.02	.36	.32	.46	.51	.59	.61	.73	.83	1.49
Total	.16	.50	.49	.69	.94	1.25	1.86	2.04	1.77	3.07

FIGURE 8-11

for 4 of the 5 modern dance companies. The total amount represented about 10 percent of the total combined operating budget of the 13 dance companies. Although we do not have detailed figures for the other two programs, the first two ballet groups to be considered for Ford Foundation Cash Reserve grants were appropriated $.76 million in 1971, relative to a combined operating budget of $1.2 million.*

Clearly, these programs had a major impact on the financial position on the dance companies over the decade and the transfer of funds in and out of the operating fund. Specifically, the Challenge Grant program appears to at least influence the large 1979 surpluses. Indeed, a look at the fund balance activity which was available for this art form will produce an even clearer picture.

Tables 8-14 and 8-23 show the operating fund balances at the end of the fiscal year for the eight ballet companies and the five modern dance companies. Figure 8-12 shows the activity over the decade. The eight ballet companies had deficits of $674,000, which were added to a beginning negative fund balance of $366,000. They transferred $1.613 million to cover these operating losses. Operating fund activity for the modern dance companies appears to have behaved in an opposite manner. However, in the middle of the decade, all five companies had fund balances in the red. Only one ended the decade still in the red, and as a group they accumulated a surplus of $457,000 over the decade. This seems to have been a direct result of the three grant programs described previously.

The results derived are in line with each other and with those expected, and are similar to other art forms. Therefore, one is led to believe that despite the small number of organizations, the sample and the subsamples are representative of the universe of dance companies with budgets over $500,000. No data base on small companies was available, so the analysis cannot be extended to the full universe of dance.

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*Ford Foundation Newsletter, Monday October 18, 1971.

OPERATING FUND BALANCE ACTIVITY
OVER 1970s DECADE
$ (Thousands)

	8 Ballet Companies	5 Modern Dance Companies
Operating Fund Balance at Beginning of 1970	-366	230
Accumulated Surplus/(Deficit)	-674	457
Transfers Into/(Out of) Operating Fund	1,613	-284
Operating Fund Balance at End of 1979	581	403

FIGURE 8-12

TABLE 8-1

EARNED INCOME ($ Millions)
13 Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	5.28	6.16	6.01	6.73	7.14	10.97	13.92	15.75	17.73	20.66	Growth Rate: Standard Deviation:	18.44% .54
Dollars Deflated By Implicit GNP Deflator	5.28	5.85	5.46	5.89	5.75	7.98	9.48	10.20	10.79	11.55	Growth Rate: Standard Deviation:	10.87% .42
Dollars Deflated By Consumer Price Index	5.28	5.85	5.52	5.94	5.78	8.00	9.48	10.13	10.69	11.39	Growth Rate: Standard Deviation:	10.66% .40

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-2

SUPPORT INCOME ($ Millions)
13 Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	4.40	4.50	5.18	6.67	6.85	8.06	9.55	10.00	9.41	12.77	Growth Rate: Standard Deviation:	12.86% .46
Dollars Deflated By Implicit GNP Deflator	4.40	4.27	4.70	5.78	5.52	5.86	6.50	6.48	5.73	7.14	Growth Rate: Standard Deviation:	5.66% .44
Dollars Deflated By Consumer Price Index	4.40	4.27	4.76	5.89	5.55	5.88	6.50	6.43	5.67	7.04	Growth Rate: Standard Deviation:	5.44% .47

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-3

TOTAL INCOME ($ Millions)
13 Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	9.68	10.75	11.19	13.39	14.83	19.02	23.47	25.75	27.15	33.42	Growth Rate: Standard Deviation:	16.08% .34
Dollars Deflated By Implicit GNP Deflator	9.68	10.21	10.16	11.61	11.95	13.83	15.98	16.68	16.52	18.69	Growth Rate: Standard Deviation:	8.68% .26
Dollars Deflated By Consumer Price Index	9.68	10.21	10.27	11.81	12.01	13.87	15.98	16.57	16.38	18.42	Growth Rate: Standard Deviation:	8.45% .25

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-4

TOTAL EXPENSES ($ Millions)
13 Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	9.15	10.64	11.15	13.44	15.29	18.88	24.02	26.06	27.58	32.67	Growth Rate: Standard Deviation:	16.53% .33
Dollars Deflated By Implicit GNP Deflator	9.15	10.11	10.13	11.66	12.32	13.73	16.36	16.88	16.79	18.27	Growth Rate: Standard Deviation:	9.08% .27
Dollars Deflated By Consumer Price Index	9.15	10.11	10.24	11.86	12.38	13.77	16.35	16.77	16.63	18.01	Growth Rate: Standard Deviation:	8.86% .28

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-5

SURPLUS/(DEFICIT) ($ Millions)
13 Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	.54	.12	.04	-.05	-.46	.14	-.55	.30	-.43	.73
Dollars Deflated By Implicit GNP Deflator	.54	.11	.04	-.04	-.37	.10	-.37	.19	-.26	.43
Dollars Deflated By Consumer Price Index	.54	.11	.04	-.04	-.37	.10	-.37	.19	-.26	.42

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-6

EARNINGS GAP ($ Millions)
13 Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	3.87	4.47	5.13	6.71	7.31	7.90	10.10	10.30	9.84	12.01	Growth Rate: Standard Deviation:	13.84% .56
Dollars Deflated By Implicit GNP Deflator	3.87	4.24	4.66	5.82	5.89	5.75	6.88	6.67	5.99	6.72	Growth Rate: Standard Deviation:	6.59% .57
Dollars Deflated By Consumer Price Index	3.87	4.24	4.71	5.92	5.91	5.76	6.88	6.63	5.93	6.62	Growth Rate: Standard Deviation:	6.37% .60

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-7

PERFORMANCE INCOME ($ Millions)
8 Ballet Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	4.25	4.77	4.65	5.10	5.75	7.87	10.09	11.10	12.62	14.74	Growth Rate: Standard Deviation:	16.16% .59
Dollars Deflated By Implicit GNP Deflator	4.25	4.53	4.22	4.43	4.63	5.72	6.88	7.19	7.68	8.25	Growth Rate: Standard Deviation:	8.75% .47
Dollars Deflated By Consumer Price Index	4.25	4.53	4.26	4.51	4.66	5.74	6.87	7.14	7.61	8.13	Growth Rate: Standard Deviation:	8.53% .44

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-8

EARNED INCOME ($ Millions)
8 Ballet Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	4.57	5.17	5.13	5.66	6.50	8.65	10.96	12.20	13.96	16.34	Growth Rate: Standard Deviation:	16.37% .52
Dollars Deflated By Implicit GNP Deflator	4.57	4.91	4.66	4.91	5.24	6.29	7.47	7.90	8.50	9.14	Growth Rate: Standard Deviation:	8.95% .40
Dollars Deflated By Consumer Price Index	4.57	4.92	4.71	5.00	5.26	6.31	7.46	7.85	8.42	9.01	Growth Rate: Standard Deviation:	8.73% .37

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-9

SUPPORT INCOME ($ Millions)
8 Ballet Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	4.24	4.09	4.69	5.98	5.91	6.81	7.69	7.96	7.64	9.70	Growth Rate: Standard Deviation:	9.75% .39
Dollars Deflated By Implicit GNP Deflator	4.24	3.89	4.26	5.19	4.76	4.95	5.24	5.15	4.65	5.42	Growth Rate: Standard Deviation:	2.76% .38
Dollars Deflated By Consumer Price Index	4.24	3.89	4.30	5.28	4.79	4.96	5.24	5.12	4.61	5.35	Growth Rate: Standard Deviation:	2.55% .40

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-10

TOTAL INCOME ($ Millions)
8 Ballet Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	8.81	9.26	9.82	11.63	12.41	15.45	18.65	20.15	21.61	26.04	Growth Rate: Standard Deviation:	13.51% .31
Dollars Deflated By Implicit GNP Deflator	8.81	8.80	8.92	10.09	10.00	11.24	12.71	13.05	13.15	14.56	Growth Rate: Standard Deviation:	6.27% .22
Dollars Deflated By Consumer Price Index	8.81	8.81	9.01	10.27	10.05	11.27	12.70	12.97	13.03	14.35	Growth Rate: Standard Deviation:	6.06% .21

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-11

TOTAL EXPENSES ($ Millions)
8 Ballet Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	8.29	9.23	9.75	11.36	12.82	15.50	19.38	20.36	22.35	25.45	Growth Rate: Standard Deviation:	14.09% .28
Dollars Deflated By Implicit GNP Deflator	8.29	8.77	8.86	9.85	10.34	11.27	13.21	13.18	13.60	14.23	Growth Rate: Standard Deviation:	6.82% .21
Dollars Deflated By Consumer Price Index	8.29	8.78	8.95	10.02	10.39	11.30	13.19	13.10	13.48	14.03	Growth Rate: Standard Deviation:	6.60% .20

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-12

SURPLUS/(DEFICIT) ($ Millions)
8 Ballet Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	.53	.03	.07	.28	-.41	-.05	-.73	-.20	-.74	.59
Dollars Deflated By Implicit GNP Deflator	.53	.03	.06	.24	-.33	-.03	-.50	-.13	-.45	.33
Dollars Deflated By Consumer Price Index	.53	.03	.06	.25	-.33	-.03	-.50	-.13	-.45	.33

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-13

EARNINGS GAP ($ Millions)
8 Ballet Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	3.72	4.06	4.62	5.70	6.32	6.85	8.42	8.16	8.38	9.11	Growth Rate: Standard Deviation:	11.01% .43
Dollars Deflated By Implicit GNP Deflator	3.72	3.86	4.20	4.94	5.10	4.98	5.74	5.28	5.10	5.09	Growth Rate: Standard Deviation:	3.93% .44
Dollars Deflated By Consumer Price Index	3.72	3.86	4.24	5.03	5.12	5.00	5.73	5.25	5.06	5.02	Growth Rate: Standard Deviation:	3.72% .46

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-14

OPERATING FUND BALANCE (End of Year) ($ Millions)
8 Ballet Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	.16	-.01	-.60	-.62	-.61	-.27	-.54	.23	.57	.58
Dollars Deflated By Implicit GNP Deflator	.16	-.01	-.54	-.54	-.49	-.20	-.37	.15	.34	.33
Dollars Deflated By Consumer Price Index	.16	-.01	-.55	-.55	-.50	-.20	-.37	.15	.34	.32

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-15

TOTAL EXPENSES ($ Millions)
10 Ballet Companies*

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	11.58	13.34	15.05	16.97	18.69	22.61	26.59	28.29	31.56	36.44	Growth Rate: 14.0% Standard Deviation: .16
Dollars Deflated By Implicit GNP Deflator	11.58	12.68	13.67	14.72	15.06	16.44	18.11	18.32	19.21	20.38	Growth Rate: 6.74% Standard Deviation: .15
Dollars Deflated By Consumer Price Index	11.58	12.68	13.82	14.98	15.13	16.49	18.10	18.20	19.03	20.09	Growth Rate: 6.52% Standard Deviation: .17

*Includes New York City Ballet and Pittsburgh Ballet.

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-16

PERFORMANCE INCOME ($ Millions)
5 Modern Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	.59	.88	.69	.84	1.21	1.89	2.40	2.90	3.15	3.70	Growth Rate: 24.60% Standard Deviation: 1.03
Dollars Deflated By Implicit GNP Deflator	.59	.83	.63	.73	.97	1.37	1.63	1.88	1.92	2.07	Growth Rate: 16.66% Standard Deviation: .89
Dollars Deflated By Consumer Price Index	.59	.83	.63	.74	.98	1.38	1.63	1.87	1.90	2.04	Growth Rate: 16.42% Standard Deviation: .86

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-17

EARNED INCOME ($ Millions)
5 Modern Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.71	.99	.88	1.07	1.48	2.32	2.96	3.55	3.77	4.32	Growth Rate: Standard Deviation:	24.39% .89
Dollars Deflated By Implicit GNP Deflator	.71	.94	.80	.93	1.19	1.69	2.02	2.30	2.29	2.41	Growth Rate: Standard Deviation:	16.46% .77
Dollars Deflated By Consumer Price Index	.71	.94	.81	.95	1.20	1.69	2.02	2.29	2.27	2.38	Growth Rate: Standard Deviation:	16.22% .76

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-18

SUPPORT INCOME ($ Millions)
5 Modern Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.16	.50	.49	.69	.94	1.25	1.86	2.04	1.77	3.07	Growth Rate: Standard Deviation:	31.94% 1.75
Dollars Deflated By Implicit GNP Deflator	.16	.48	.44	.60	.76	.91	1.27	1.32	1.08	1.72	Growth Rate: Standard Deviation:	23.53% 1.67
Dollars Deflated By Consumer Price Index	.16	.48	.45	.61	.76	.91	1.27	1.31	1.07	1.69	Growth Rate: Standard Deviation:	23.28% 1.69

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-19

TOTAL INCOME ($ Millions)
5 Modern Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.87	1.49	1.37	1.76	2.42	3.57	4.82	5.60	5.54	7.38	Growth Rate: Standard Deviation:	26.53% .88
Dollars Deflated By Implicit GNP Deflator	.87	1.42	1.25	1.53	1.95	2.60	3.28	3.62	3.37	4.13	Growth Rate: Standard Deviation:	18.47% .79
Dollars Deflated By Consumer Price Index	.87	1.42	1.26	1.55	1.96	2.61	3.28	3.60	3.34	4.07	Growth Rate: Standard Deviation:	18.22% .79

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-20

TOTAL EXPENSES ($ Millions)
5 Modern Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	.86	1.41	1.40	2.08	2.47	3.38	4.64	5.70	5.23	7.22	Growth Rate: Standard Deviation:	25.98% .80
Dollars Deflated By Implicit GNP Deflator	.86	1.34	1.27	1.80	1.99	2.46	3.17	3.69	3.18	4.04	Growth Rate: Standard Deviation:	17.93% .75
Dollars Deflated By Consumer Price Index	.86	1.34	1.28	1.84	2.00	2.46	3.16	3.67	3.15	3.98	Growth Rate: Standard Deviation:	17.69% .77

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-21

SURPLUS/(DEFICIT) ($ Millions)
5 Modern Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	.01	.09	-.03	-.32	-.05	.20	.18	-.10	.31	.17
Dollars Deflated By Implicit GNP Deflator	.01	.08	-.02	-.28	-.04	.14	.12	-.06	.19	.09
Dollars Deflated By Consumer Price Index	.01	.08	-.02	-.28	-.04	.14	.12	-.06	.19	.09

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-22

EARNINGS GAP ($ Millions)
5 Modern Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	.15	.41	.51	1.01	.99	1.05	1.68	2.14	1.46	2.90	Growth Rate: 30.75% Standard Deviation: 2.18
Dollars Deflated By Implicit GNP Deflator	.15	.39	.46	.88	.80	.76	1.14	1.39	.89	1.62	Growth Rate: 22.42% Standard Deviation: 2.11
Dollars Deflated By Consumer Price Index	.15	.39	.47	.89	.80	.77	1.14	1.38	.88	1.60	Growth Rate: 22.18% Standard Deviation: 2.13

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-23

OPERATING FUND BALANCE (End of Year) ($ Millions)
5 Modern Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	.26	.34	.22	-.13	-.18	-.05	.07	-.04	.16	.40
Dollars Deflated By Implicit GNP Deflator	.26	.32	.20	-.11	-.14	-.04	.05	-.03	.10	.23
Dollars Deflated By Consumer Price Index	.26	.32	.20	-.12	-.14	-.04	.05	-.03	.10	.22

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-24

PERFORMANCE INCOME ($ Millions)
3 Larger Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	3.49	3.91	3.52	3.65	3.82	5.13	6.78	6.69	7.24	8.11	Growth Rate: Standard Deviation:	11.03% .66
Dollars Deflated By Implicit GNP Deflator	3.49	3.72	3.20	3.17	3.08	3.73	4.62	4.33	4.41	4.54	Growth Rate: Standard Deviation:	3.95% .55
Dollars Deflated By Consumer Price Index	3.49	3.72	3.23	3.22	3.09	3.74	4.61	4.30	4.37	4.47	Growth Rate: Standard Deviation:	3.74% .53

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-25

EARNED INCOME ($ Millions)
3 Larger Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	3.68	4.17	3.76	3.92	4.18	5.42	7.15	7.14	7.80	8.69	Growth Rate: Standard Deviation:	11.11% .63
Dollars Deflated By mplicit GNP Deflator	3.68	3.96	3.41	3.40	3.37	3.94	4.87	4.62	4.75	4.86	Growth Rate: Standard Deviation:	4.03% .51
Dollars Deflated By Consumer Price Index	3.68	3.96	3.45	3.46	3.38	3.95	4.87	4.59	4.70	4.79	Growth Rate: Standard Deviation:	3.82% .49

Data deflated using indices readjusted to FY70 as the base.
ource of data: The Ford Foundation and individual organization financial statements.

TABLE 8-26

SUPPORT INCOME ($ Millions)
3 Larger Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	3.21	3.16	3.50	4.21	3.66	4.04	4.70	4.27	4.34	5.49	Growth Rate: Standard Deviation:	5.29% .41
Dollars Deflated By mplicit GNP Deflator	3.21	3.00	3.18	3.65	2.96	2.94	3.20	2.76	2.64	3.07	Growth Rate: Standard Deviation:	-1.42% .39
Dollars Deflated By Consumer Price Index	3.21	3.00	3.21	3.72	2.96	2.95	3.20	2.75	2.62	3.03	Growth Rate: Standard Deviation:	-1.63% .41

Data deflated using indices readjusted to FY70 as the base.
ource of data: The Ford Foundation and individual organization financial statements.

TABLE 8-27

TOTAL INCOME ($ Millions)
3 Larger Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
ctual ollars	6.89	7.33	7.26	8.13	7.84	9.46	11.35	11.40	12.15	14.18	Growth Rate: Standard Deviation:	8.60% .38
ollars Deflated By mplicit GNP Deflator	6.89	6.97	6.59	7.05	6.32	6.88	8.07	7.38	7.39	7.93	Growth Rate: Standard Deviation:	1.68% .29
ollars Deflated By onsumer Price Index	6.89	6.97	6.66	7.18	6.35	6.90	8.07	7.34	7.33	7.82	Growth Rate: Standard Deviation:	1.47% .29

ata deflated using indices readjusted to FY70 as the base.
ource of data: The Ford Foundation and individual organization financial statements.

TABLE 8-28

TOTAL EXPENSES ($ Millions)
3 Larger Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
ctual ollars	6.32	7.08	7.23	7.61	8.07	9.83	12.89	12.00	12.82	13.93	Growth Rate: Standard Deviation:	9.90% .42
ollars Deflated By mplicit GNP Deflator	6.32	6.73	6.56	6.60	6.50	7.15	8.78	7.77	7.80	7.79	Growth Rate: Standard Deviation:	2.89% .34
ollars Deflated By onsumer Price Index	6.32	6.73	6.64	6.72	6.53	7.17	8.77	7.72	7.73	7.68	Growth Rate: Standard Deviation:	2.68% .34

ata deflated using indices readjusted to FY70 as the base.
ource of data: The Ford Foundation and individual organization financial statements.

TABLE 8-29

SURPLUS/(DEFICIT) ($ Millions)
3 Larger Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	.56	.24	.03	.53	-.23	-.37	-1.03	-5.92	-6.72	.25
Dollars Deflated By Implicit GNP Deflator	.56	.23	.03	.46	-.18	-.27	-.70	-3.83	-4.09	.14
Dollars Deflated By Consumer Price Index	.56	.23	.03	.47	-.19	-.27	-.70	-3.81	-4.05	.14

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-30

EARNINGS GAP ($ Millions)
3 Larger Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	2.64	2.91	3.47	3.68	3.89	4.41	5.74	4.86	5.02	5.24	Growth Rate: Standard Deviation:	8.27% .51
Dollars Deflated By Implicit GNP Deflator	2.64	2.77	3.15	3.19	3.21	3.21	3.91	3.14	3.05	2.93	Growth Rate: Standard Deviation:	1.36% .49
Dollars Deflated By Consumer Price Index	2.64	2.77	3.19	3.25	3.15	3.22	3.91	3.13	3.03	2.89	Growth Rate: Standard Deviation:	1.16% .52

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-31

TOTAL EXPENSES ($ Millions)
4 Larger Dance Companies*

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	9.31	10.79	12.03	12.59	13.20	16.07	19.16	18.79	20.69	23.44	Growth Rate: Standard Deviation:	10.55% .26
Dollars Deflated By Implicit GNP Deflator	9.31	10.26	10.92	10.92	10.64	11.69	13.05	12.17	12.59	13.11	Growth Rate: Standard Deviation:	3.50% .22
Dollars Deflated By Consumer Price Index	9.31	10.26	11.05	11.11	10.68	11.72	13.04	12.09	12.48	12.92	Growth Rate: Standard Deviation:	3.29% .23

*Includes New York City Ballet

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-32

PERFORMANCE INCOME ($ Millions)
10 Smaller Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.35	1.73	1.82	2.29	3.13	4.63	5.71	7.31	8.53	10.34	Growth Rate: Standard Deviation:	27.08% .55
Dollars Deflated By Implicit GNP Deflator	1.35	1.64	1.65	1.99	2.52	3.37	3.89	4.73	5.19	5.78	Growth Rate: Standard Deviation:	18.93% .44
Dollars Deflated By Consumer Price Index	1.35	1.64	1.67	2.02	2.53	3.38	3.89	4.70	5.14	5.70	Growth Rate: Standard Deviation:	18.74% .42

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-33

EARNED INCOME ($ Millions)
10 Smaller Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.60	2.00	2.26	2.81	3.80	5.55	6.77	8.61	9.93	11.96	Growth Rate: Standard Deviation:	26.70% .47
Dollars Deflated By Implicit GNP Deflator	1.60	1.90	2.05	2.43	3.06	4.04	4.61	5.57	6.04	6.69	Growth Rate: Standard Deviation:	18.62% .38
Dollars Deflated By Consumer Price Index	1.60	1.90	2.07	2.48	3.08	4.05	4.61	5.54	5.99	6.59	Growth Rate: Standard Deviation:	18.38% .37

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-34

SUPPORT INCOME ($ Millions)
10 Smaller Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.20	1.44	1.67	2.45	3.19	4.02	4.85	5.73	5.07	7.27	Growth Rate: Standard Deviation:	22.49% .79
Dollars Deflated By Implicit GNP Deflator	1.20	1.37	1.52	2.12	2.57	2.92	3.30	3.71	3.09	4.06	Growth Rate: Standard Deviation:	14.68% .75
Dollars Deflated By Consumer Price Index	1.20	1.37	1.53	2.16	2.58	2.93	3.30	3.69	3.06	4.01	Growth Rate: Standard Deviation:	14.45% .77

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-35

TOTAL INCOME ($ Millions)
10 Smaller Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	2.80	3.43	3.93	5.26	6.99	9.57	11.62	14.35	15.00	19.23	Growth Rate: Standard Deviation:	25.01% .50
Dollars Deflated By Implicit GNP Deflator	2.80	3.26	3.57	4.56	5.63	6.96	7.92	9.29	9.13	10.75	Growth Rate: Standard Deviation:	17.04% .45
Dollars Deflated By Consumer Price Index	2.80	3.26	3.61	4.64	5.66	6.98	7.91	9.23	9.05	10.60	Growth Rate: Standard Deviation:	16.80% .46

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-36

TOTAL EXPENSES ($ Millions)
10 Smaller Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	2.83	3.56	3.92	5.82	7.22	9.05	11.13	14.06	14.76	18.73	Growth Rate: Standard Deviation:	24.03% .46
Dollars Deflated By Implicit GNP Deflator	2.83	3.38	3.56	5.05	5.82	6.58	7.58	9.11	8.98	10.48	Growth Rate: Standard Deviation:	16.12% .45
Dollars Deflated By Consumer Price Index	2.83	3.38	3.60	5.14	5.85	6.60	7.58	9.05	8.90	10.33	Growth Rate: Standard Deviation:	15.89% .47

Data deflated using indices readjusted to FY70 as the base.
Source of data: The Ford Foundation and individual organization financial statements.

TABLE 8-37

SURPLUS/(DEFICIT) ($ Millions)
10 Smaller Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
ctual ollars	-.02	-.12	.008	-.57	-.23	.52	.48	.29	.24	.50
ollars Deflated By nplicit GNP Deflator	-.02	-.11	.007	-.49	-.18	.38	.33	.19	.15	.28
ollars Deflated By onsumer Price Index	-.02	-.11	.007	-.50	-.19	.38	.33	.19	.14	.27

ata deflated using indices readjusted to FY70 as the base.
ource of data: The Ford Foundation and individual organization financial statements.

TABLE 8-38

EARNINGS GAP ($ Millions)
10 Smaller Dance Companies

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
ctual ollars	1.23	1.56	1.67	3.02	3.42	3.50	4.37	5.44	4.83	6.77	Growth Rate: Standard Deviation:	20.19% .89
ollars Deflated By nplicit GNP Deflator	1.23	1.48	1.52	2.62	2.75	2.54	2.98	3.52	2.94	3.79	Growth Rate: Standard Deviation:	12.52% .89
ollars Deflated By onsumer Price Index	1.23	1.48	1.39	2.66	2.59	2.55	2.98	3.50	2.91	3.73	Growth Rate: Standard Deviation:	12.29% .92

ata deflated using indices readjusted to FY70 as the base.
ource of data: The Ford Foundation and individual organization financial statements.

CHAPTER 9

MUSEUMS

Museums as an organizational type in this country date back to the second half of the 19th Century. Many of the more well-known large museums have recently celebrated a centennial anniversary. As an ongoing institutional type, museums slightly predate orchestras, the oldest institutional type of performing arts. As discussed in Chapter 3, two surveys have produced data on founding dates. Museums USA[1/] found 364 museums that were founded prior to 1900 and the NCES/IMS study[2/] found 401 museums. This represents 20 percent of the Museums USA population and 8 percent of the NCES/IMS population. The NCES/IMS study also found 1955 museums that were founded after 1960 (about 40 percent). Thus, one would expect to find slower rates of growth for those older (and usually larger) museums in comparison to the "younger" organizational types in the performing arts.

The Economics of Museums Versus the Performing Arts

The discussion in Chapter 4 on the economics of arts organizations has grown out of work on the performing arts and tends to describe those institutions better than museums. Several things in particular should be noted that have an impact on the data and analysis of museums. The framework in Chapter 4 is built around the concept of an "earnings gap" which is the difference between earned income and expenses. Museums, until about the last 10 to 15 years, had not sought earned income in the same way that performing arts institutions had. Museums considered themselves more like libraries, which do not charge for the service of lending books or using reference materials, but pay for themselves through tax dollars (in the case of public libraries) or membership dues and contributions (for private libraries). This differs from the performing arts which have traditionally sold tickets for their services (performances),

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[1/] National Endowment for the Arts, Museums, USA. A Study conducted by the National Research Center of the Arts, Inc., 1974.

[2/] National Center for Education Statistics/Institute of Museum Services 1978 Museum Universe Survey. Superintendent of Documents, U.S. Government Printing Office, Washington, D.C.

albeit at prices that do not meet expenses. As American philanthropists of the late 19th Century amassed art collections and set up museums which would be open to the public (either private nonprofit or government owned), the organizations funded themselves through individual private gifts and/or government appropriations. The individual museum goer was not asked to pay at the door for this visit.

In the 1970's, increasing numbers of museums instituted an admissions charge (although often disguised as a donation), but still most museums do not look at admission income as the major source of income. Thus, the earnings gap of the performing arts model does not fit museums exactly. Instead, museums, as an organizational type have looked to a wider variety of income sources:

Admissions,
Memberships,
Tuition and Fees (for general courses and lectures and/or degree-granting fine arts curriculum),
Events of performing and media arts groups,
Investments,
Auxiliary activities (restaurants, gift shops), and always
Grants and contributions.

This variety reflects multiple activities that are conducted under the auspices of museums. Museums are not producing organizations, but rather sponsoring organizations. Their main function is conservation and exhibition of art works[3/] (not making visual art, which is done almost exclusively by individuals, not organizations). They frequently have good sized, physical facilities, conducive to performances (particularly chamber music). Thus, many museums have evolved into arts centers where the traditional museum function is complemented by an educational and sponsorship function. This functional multiplicity also has an impact on the economic analysis, since it increases both the types of inputs and types of outputs.

[3/] A current definition of a museum reads, "A Museum is ... an institution organized on a permanent basis for essentially educational or aesthetic purposes and ... utilizes a staff; owns or uses tangible objects, whether animate or inanimate; cares for these objects; and exhibits them to the public on a regular basis". NCES/IMS, Museum Program Survey, Price, Dirocco, and Lewis, Macro Systems, Inc., 1981. p.2.

The types of expenses (cost of inputs) in a museum also differ from the performing arts. In the performing arts, labor plays the significant part. In museums, the physical plant (building and grounds) and the art works are important economic inputs. However, the physical plant (frequently) and the works of art (almost always) do not show up in the financial data. The bulk of art in museums has been contributed. There are some museums with acquisition funds, but that accounts for a very small proportion of the "stock" of art in museums. The accounting profession has shied away from valuing art works and, therefore, art given as a charitable gift seldom gets into the financial records in any way. This translates into no surrogate measure for artistic quality/quantity of inputs. With no value for the collection and almost no collection expenses, one major part of the economic picture is missing.[4]

These differences do not render the economic framework of Chapter 4 useless in the case of museums, but rather mean that some of its aspects need to be used with care. Museums do indeed have a mix of "revenue" and "support" (the accounting profession's terms for earned and unearned income). To end a year "in the black" (with an organizational balance or surplus, a museum must receive grants and contributions equal to or greater than the amount of expenses minus revenue (an earnings gap). But because of the traditional lesser emphasis on the earnings gap, the surplus/(deficit) will form the central core of the analysis in this chapter rather than the earnings gap.

One other difficult aspect is the number and dollar amount of non-operating funds. Museums, as an organizational type, have had endowment, (physical) plant, and acquisition funds for a longer period of time than the performing arts, including orchestras. They have followed the example of colleges and universities not only in their multiple non-operating funds, but also in their accounting practices of not recording the building as an asset. Until the 1970's, during which time the accounting profession developed reporting guidelines which covered arts organizations, museums were free to use any generally accepted reporting format, with the result that financial data had been non-standard and frequently followed college and university formats rather than any accepted format for the arts.

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[4] From accounting and managerial perspectives, trying to value collections is very problemmatic. However, the economist needs some measure to understand and explain economic behavior.

The use of multiple funds by the larger museums has had an interesting effect on data collected and on analyses. Almost all data collected (there have been four major studies on museums between 1965 and 1980; see Chapter 3 for discussion on these studies) measured the operating fund and its results. In the performing arts, the operating fund accounts for most (if not all) of the financial activity of the organization. As was discussed in the preceding chapters on each performing arts discipline, the 70's saw a significant growth in the establishment of endowment, cash reserve, and other non-operating funds in the performing arts.

However, the operating fund for a number of large museums does not include the entire financial activity; much occurred in the plant, endowment, and other funds. As will be shown later on, in the sample where we data on both operating and all other funds (for six museums), the operating fund represented about half of the financial activity of the total organization at the beginning of the decade and about two-thirds at the end. Much of these non-operating funds have grown through gifts restricted by donors to particular uses; thus, boards of trustees and museum directors have not always had unlimited liberty to use these funds. These restricted funds impact the analysis of economic behavior of museums using all funds in that management does not necessarily have all the museum's resources at its disposal; hence, the picture is not always as rosy as may appear. Countered against this is the opposite problem that ignoring these funds leads to an overly dismal picture. Therefore, we present analyses both with and without these other funds.

The Sample and the Data

No data base of annual financial information on museums was found for this study. Several universe studies had been made during the late sixties and seventies, but each used a different set of criteria for including a museum in the survey. (See Chapter 3 and Appendix A.) Therefore, we had to build one.

Using the universe information as published in Museum News[5] and described in the NCES/IMS Program survey,[6] we drew a sample based on size, governing authority, and geographic area. We asked the Museum Program at the National Endowment for the Arts, the Institute of Museum Services, and the American Association of Museums each to provide a list of 50 museums distributed geographically. The samples included art museums and other types of museums that had a significant collection of art (see Chapter 3 on museums for a discussion of the problem of what constitutes an art museum). We compared the three lists with that of our own and (choosing those museums cited on the most lists)generated a sample of 45 museums that was representative of the universe in geographic location and governing authority. Our sample had a range of budget sizes, but included more museums with over $100,000 in expenses per year than is representative of the universe. In fact, of the final responding group, only two had expenses under $100,000 in 1970.[7] Thus, the resulting sample was one of larger organizations. Incidentally, this also matched the budget sizes of organizations in the performing arts samples.

We sought financial statements (often published in annual reports) from the Smithsonian and National Gallery of Art libraries. From those museums for whom we did not find statements for all years of the decade, we requested the missing statements. Thirty-three museums were able to provide data for at least the years of 1973 to 1979; 26 of these provided statements for the years 1970 through 1979; and 27 of the 33 for the years 1971 through 1980. The names of the 33 and the analyses in which they are included are listed in Figures 9-1 and 9-2.

The financial statements were examined for consistency from year to year and then converted to a standard format as similar to the Ford Foundation and the performing arts data bases, as appropriate. Because the data came from financial statements and annual reports, reporting variances frequently left gaps in the data for which we did not impute data, except on two limited occasions. Sources of support income and types of expenses were two areas that were reported inconsistently from

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[5] Lee Kimche, "American Museums: The Vital Statistics," Museum News. American Association of Museums. October 1980, pp 52-57.

[6] NCES, IMS, Op cit.

[7] This was to be expected as our experience has been that arts organizations with under $100,000 budgets have difficulty responding to requests for financial data and financial reports.

Museums in the Data Base

Albright-Knox Art Gallery of the Buffalo Fine Arts Academy, N.Y.

Arizona State Museum, University of Arizona, Tucson

The Art Institute of Chicago

The Brooklyn Museum, Brooklyn Institute of Arts and Sciences

The Cincinnati Art Museum

Columbia Museum of Art and Science, South Carolina

The Denver Art Museum

Field Museum of Natural History, Chicago

Fogg Museum, Harvard University

Heard Museum of Anthropology and Primitive Art, Phoenix

Hebrew-Union College Skirball Museum, Los Angeles

Indianapolis Museum of Art

Los Angeles County Museum of Art

Louisiana State Museum, New Orleans

The Metropolitan Museum of Art, New York

Milwaukee Public Museum

Museum of Fine Arts, Boston

Museum of Fine Arts, Houston

The Museum of the City of New York

The Museum of Modern Art, New York

Philadelphia Museum of Art

Portland Art Museum, Oregon

St. Louis Art Museum

Seattle Art Museum

J.B. Speed Art Museum, Louisville, Kentucky

Tennessee Fine Arts Center and Botanical Garden, Nashville

University of Nebraska State Museum, Lincoln

Wadsworth Atheneum, Hartford, Connecticut

Walker Art Center, Minneapolis

Walters Art Gallery, Baltimore

Henry Francis duPont Winterthur Museum, Winterthur, Delaware

Worcester Art Museum, Worcester, Massachusetts

Yale University Art Gallery

FIGURE 9-1

MUSEUM SAMPLES BY TYPE OF ANALYSIS

Type of Analysis:	Total Group			OP Fund			Total Funds			Both Funds	Org'l. Type	Income	Attendance			Art Schools	Endowment		Total Funds Balance		
Years:	70-79	71-80	73-79	70-79	73-79	70-79	70-79	73-79	70-79	70-79	70-79	70-79	70-79	71-80	73-79	70-79	70-79	70-79	70-79	71-80	73-79
Albright-Knox				x		s					P	x	x	x	x						
Arizona	x																				
Art Institute				x	all but	L	x	x	L	x	P	x				x	x	L	x	x	x
Brooklyn		all but		x		L					P										
Cincinnati				x		S					P	x									
Columbia	all but			x		S					P		x		x		x	S			
Denver					x		x	x	M		P	x					x	M	x	x	x
Field		x		x		L					P	x									
Fogg				x		S					U										
Heard				x		S					P						x	S	x	x	x
Hebrew Union	x										U										
Indianapolis	x	x						x												x	x
L. A. County					x		x	x	L		G	x							x	x	x
Louisiana	x	x			x			x													
Metropolitan				x		L	x	x	L	x	P	x			x		x	L	x	x	x
Milwaukee		x			x		x	x	M		G										
MFA - Boston			all	x		L	x	x	L	x	P	x	x	x	x	x	x	L	x	x	x
MFA - Houston					x		x	x	S		P	x			x	x			x	x	x
Museum of N.Y.				x		S	x	x	M	x	P	x					x	M	x	x	x
Museum of Modern Art				x		L		x			P	x	x	x	x					x	x
Philadelphia				x		L	x	x	L	x	P	x				x	x	L	x	x	x
Portland				x		S					P	x									
St. Louis							x	x	M		G	x					x	M			x
Seattle	x							x						x	x					x	x
J. B. Speed							x	x	S		P	x							x	x	x
Tennessee	x	x			x			x													x
Univ. of Nebraska					x		x	x	S		U						x	S	x	x	x
Wadsworth				x		S					P										
Walker	x																				
Walters				x		S	x	x	S	x	G	x	x		x						
Winterthur		x			x		x	x	L		P		x		x		x	L	x		x
Worcester				x		S					P	x				x	x	M			
Yale				x		S					U										
	26	27	33	18	25	18	14	19	14	6	27	17	6	4	9	5	12	12	12	14	17

S = Small
M = Medium
L = Large

P = Private museum
G = Government owned museum
U = University affiliated museum

Size varies, depending on analysis (see text)

FIGURE 9-2

year to year and museum to museum, resulting in little usable data. More discussion on general data problems is contained in Appendix B. The annual reports, however, did provide a report of the year by the president of the board and the director. These provided clues and details on the reasons behind the finances. Little operational detail was available. Using financial statements (audited in most cases) to build a data base did provide one important plus--we could examine the financial activity as reported in operating and non-operating funds.

Throughout the chapter, we make use of the sample of 26 for 1970-79 and its subsamples for our analysis. The enlarged sample of 33 for 1973-79 and its subsamples are used to give greater confidence to the data and analysis.[8/]

GROWTH OVER THE DECADE

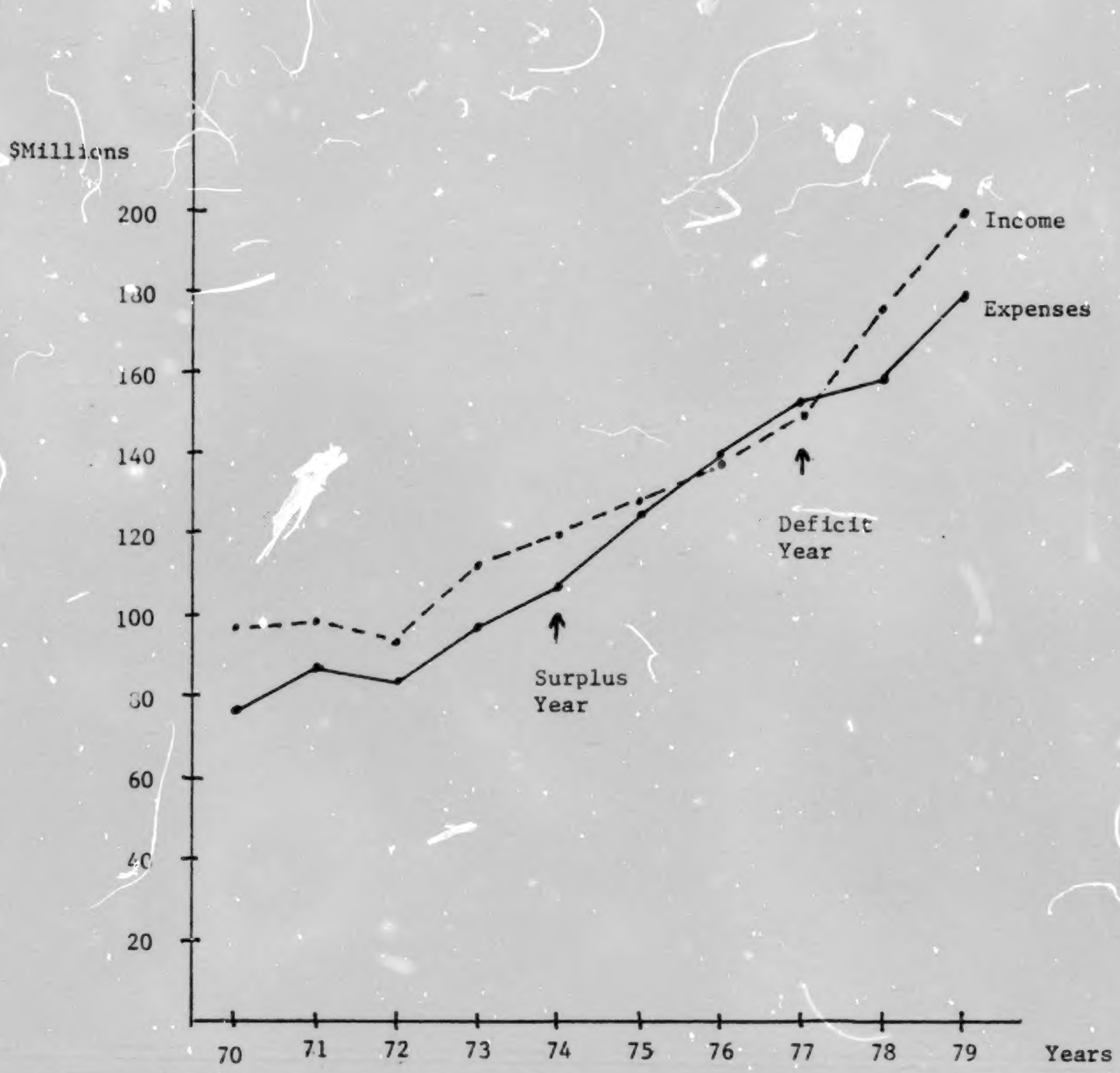
Figures 9-3, and 9-4, and Tables 9-1, 9-2, 9-4, and 9-5 show income and expenses for samples of 26, (1970-79) and 33 museums, (1973-79) respectively. The difference between the two lines is the surplus/(deficit). Each of these samples shows a surplus in most years. Figure 9-5 shows the surplus/(deficit) graphed out for the two samples. Both samples of museums started in a surplus position at the beginning of the decade, incurred a deficit right after the middle of the decade, but ended the decade with a surplus. Over the decade, the 26 museums accumulated a surplus of almost $100 million ($99.66 million).

However, this picture is somewhat misleading. For some museums, the financial data included only the operating fund, while for other museums, the data reflected the total museum with all operating and non-operating funds. Only six of these museums had complete information for both the operating fund and the institution as a whole.[9/] The samples were, therefore, stratified by type of financial data reported. Furthermore, the subsamples over the entire decade were then stratified by budget size as shown in Figure 9-6.

[8/] Use is not made of the sample of 27 for 1971-80 (even though its data are reported in the tables at the end of the chapter), since it contains 24 museums in common with the 26 and hence, all graphs for the 27 are virtual carbon copies of those for the 26.

[9/] For the largest sample of 26 museums we used whatever income and expense data was available from the financial reports and annual reports. We coded the data base for both operating funds and total funds to be able to examine the differences. For the sample of 26, we used total funds for the six museums that reported both.

TOTAL INCOME AND EXPENSES
(Showing Surplus/(Deficit))
26 Museums
1970-1979

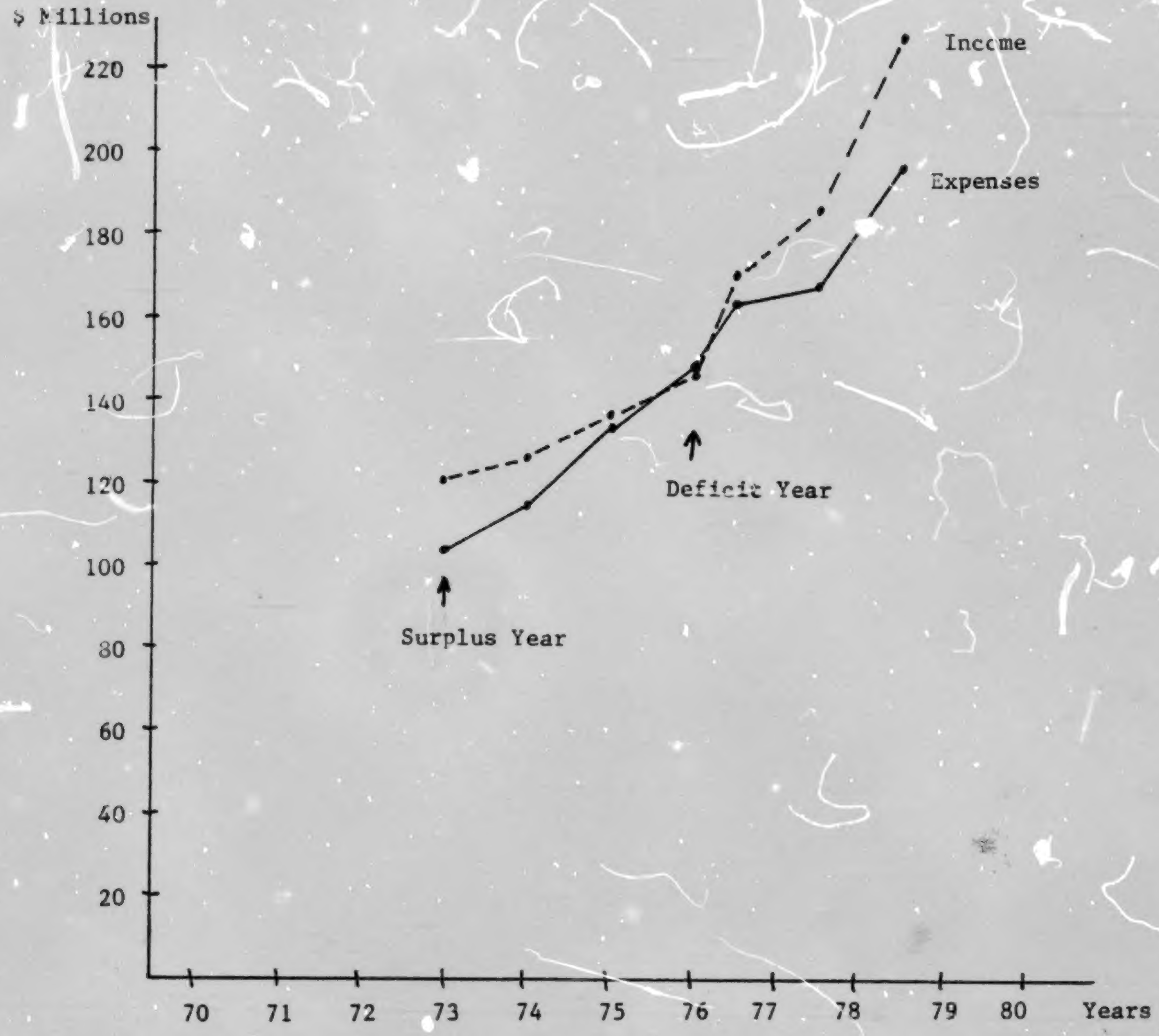


Source of data: Individual museum financial statements.

Data are in Tables 9-1 and 9-2.

FIGURE 9 - 3

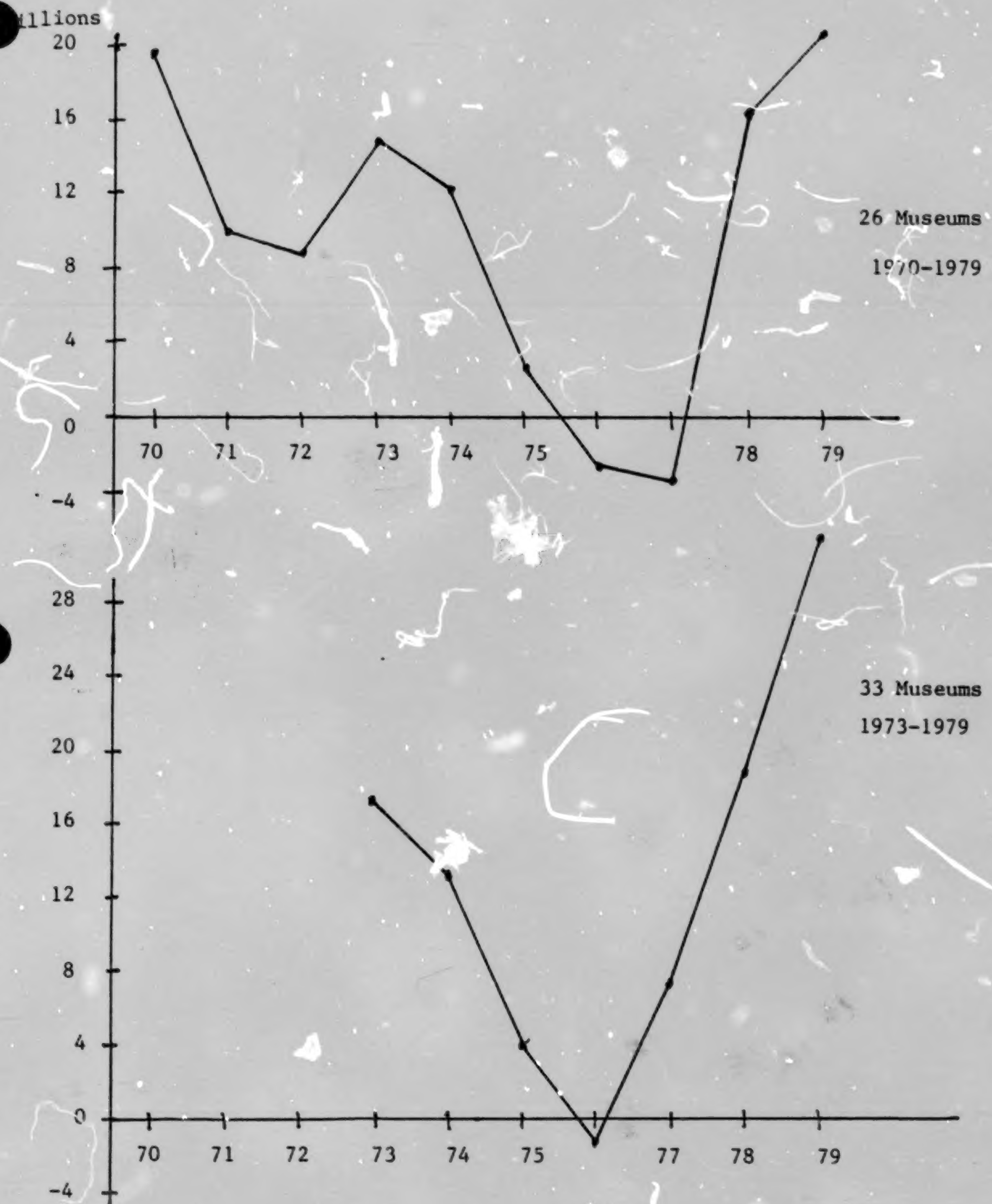
TOTAL INCOME AND EXPENSES
(Showing Surplus/(Deficit))
33 Museums
1973-1979



Source of data: Individual museum financial statements.
Data are in Tables 9-4 through 9-9

FIGURE 9 - 4

SURPLUS/(DEFICIT)
26 Museums: 1970-1979
and
33 Museums: 1973-1979



Source of data: Individual museum financial statements.
Data are in Tables 9-3 and 9-6.

FIGURE 9 - 5

It should be noted that four of the largest museums in our sample, Art Institute of Chicago, Metropolitan Museum, Museum of Fine Arts-Boston, and Philadelphia Museum of Art are in the subsamples of 7 large museums reporting operating funds, 6 large museums reporting all funds, and 6 museums reporting both operating and all funds. These four museums account for a large proportion in dollar value of the total sample of 26.

Figures 9-7 through 9-13 provide a picture of the difference between financial data of the operating fund and the total of all funds in various samples for 1970 through 1979. Figure 9-7 (Tables 9-10, 9-11, 9-21 and 9-22) shows that, in the operating fund, expenses were higher than income (a deficit position) for all years of the decade except 1979; whereas in only two years of the decade were expenses greater for the total of all funds. This figure also reflects the much more even growth of income and expenses in the operating fund in comparison to the total of all funds[10/] The top graphs of Figures 9-8 and 9-9 show the surplus/(deficit) of the 18 museums (reporting on the operating fund) and of the 14 museums reporting all funds. These clearly show the deficits of the operating fund versus the surpluses of the total all funds. The other aspect to note is the magnitude of the surpluses (up to $20 million) in the total funds versus the deficits (up to $3 million) in the operating funds. The bottom graphs of these two figures show similar picture for the enlarged samples of 25 and 19 for 1973-79.

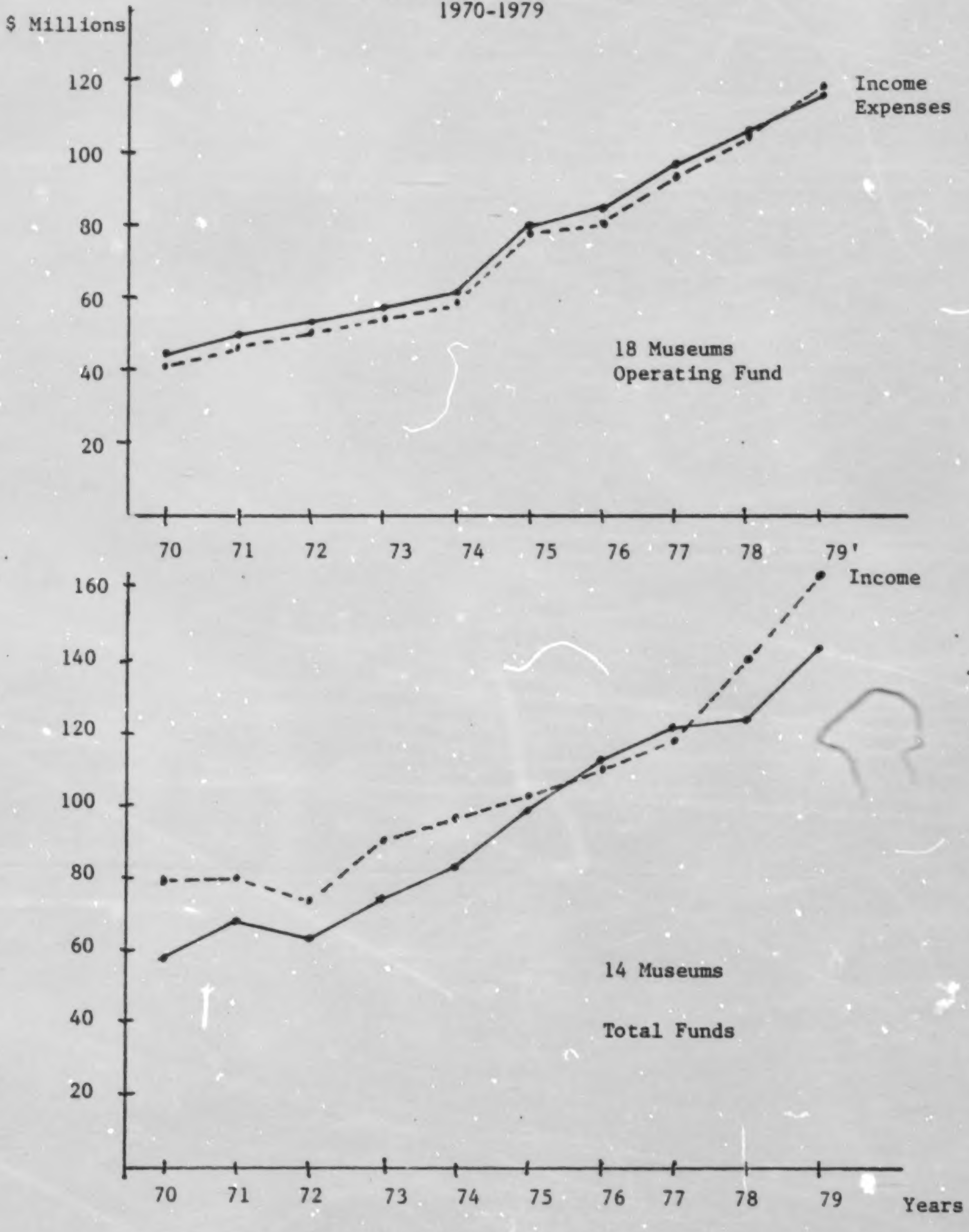
[10/] The latter result is not totally unexpected as volatility is often the nature of non-operating funds.

Stratification of 26 Museums: 1970-79

18 Museums reporting Operating fund	14 Museums reporting all funds
11 Small: under $1 million in total operating fund expenses in 1970	4 Small: under $1 million (all funds) in 1970
7 Large: $1 million and over in total operating expenses in 1970	4 Medium: between $1 and $3 million (all funds) in 1970
	6 Large: over $3 million (all funds) in 1970

FIGURE 9-6

OPERATING FUND AND TOTAL FUNDS
Income and Expenses
1970-1979

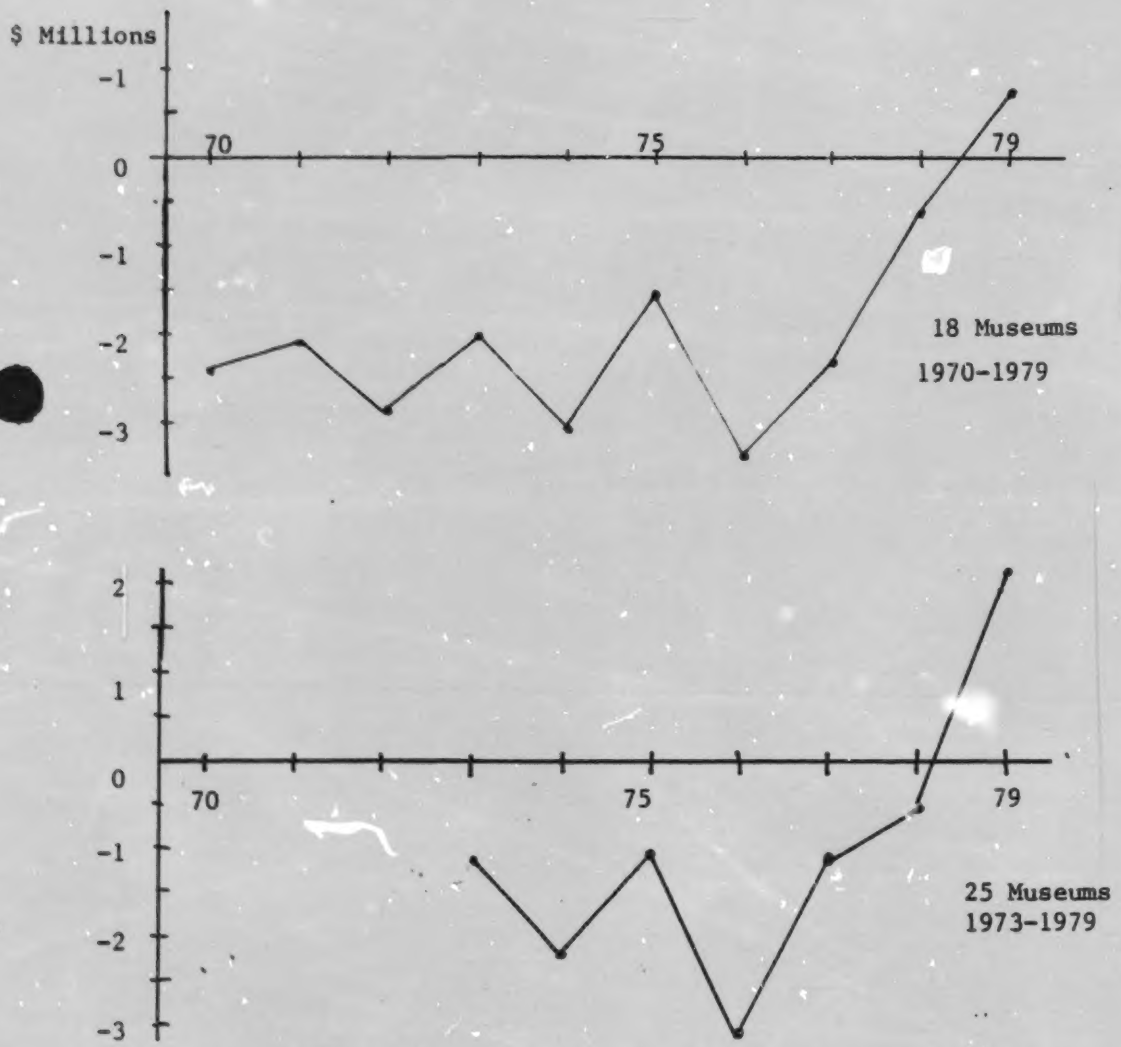


Source of data: Individual museum financial statements.
Data are in Tables 9-10, 9-11, 9-21, and 9-22.

FIGURE 9 - 7

MUSEUMS WITH OPERATING FUND
Surplus/(Deficit)

1970-1979
and
1973-1979

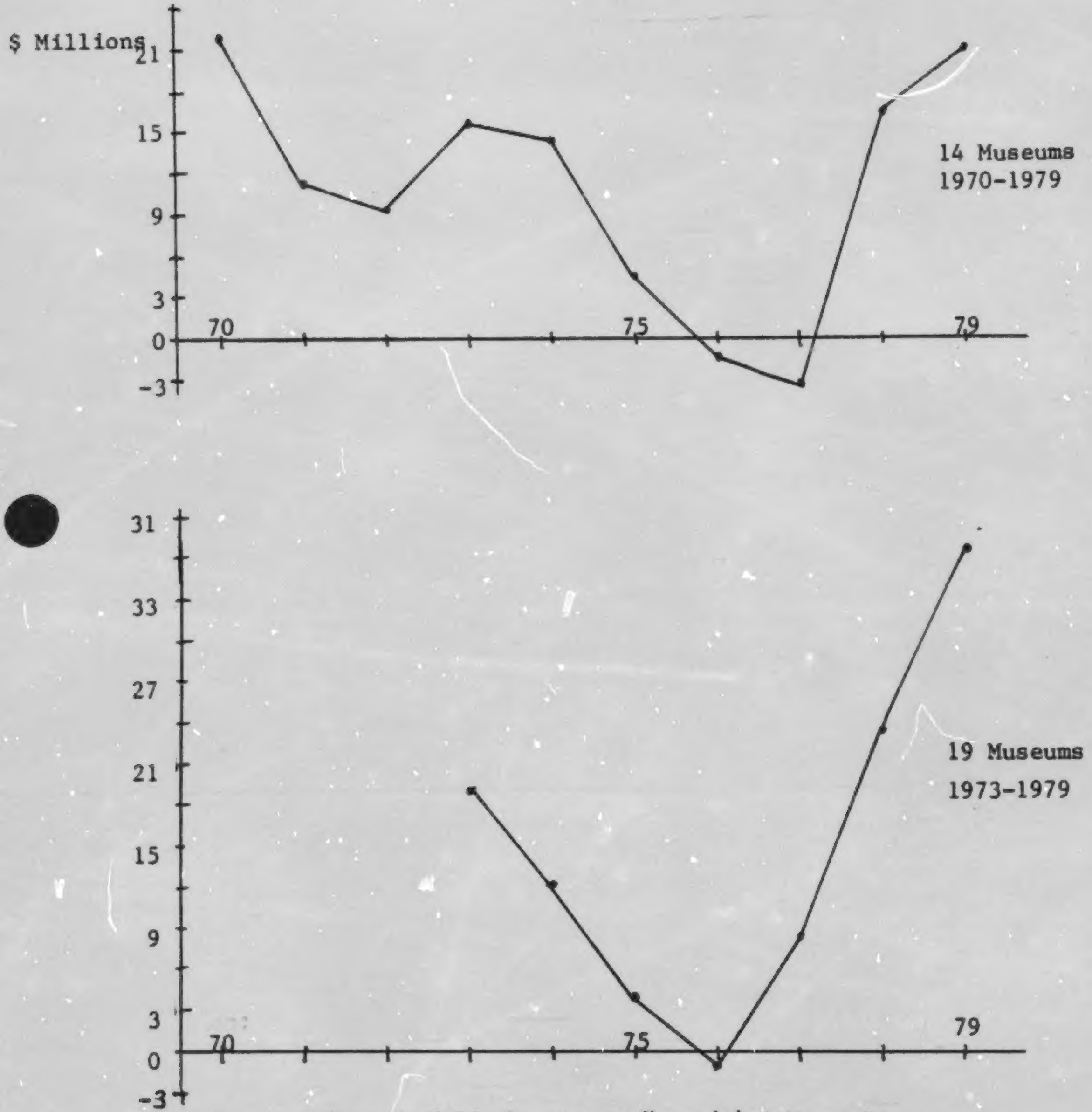


Source of data: Individual museum financial statements.
Data are in Tables 9-12 and 9-15.

FIGURE 9 - 8

Museums with Total Funds
Surplus/(Deficit)

1970 - 1979
and
1973 - 1979



Source of data: Individual museums financial statements.
Data are in Tables 9-23 and 9-26.

FIGURE 9 - 9

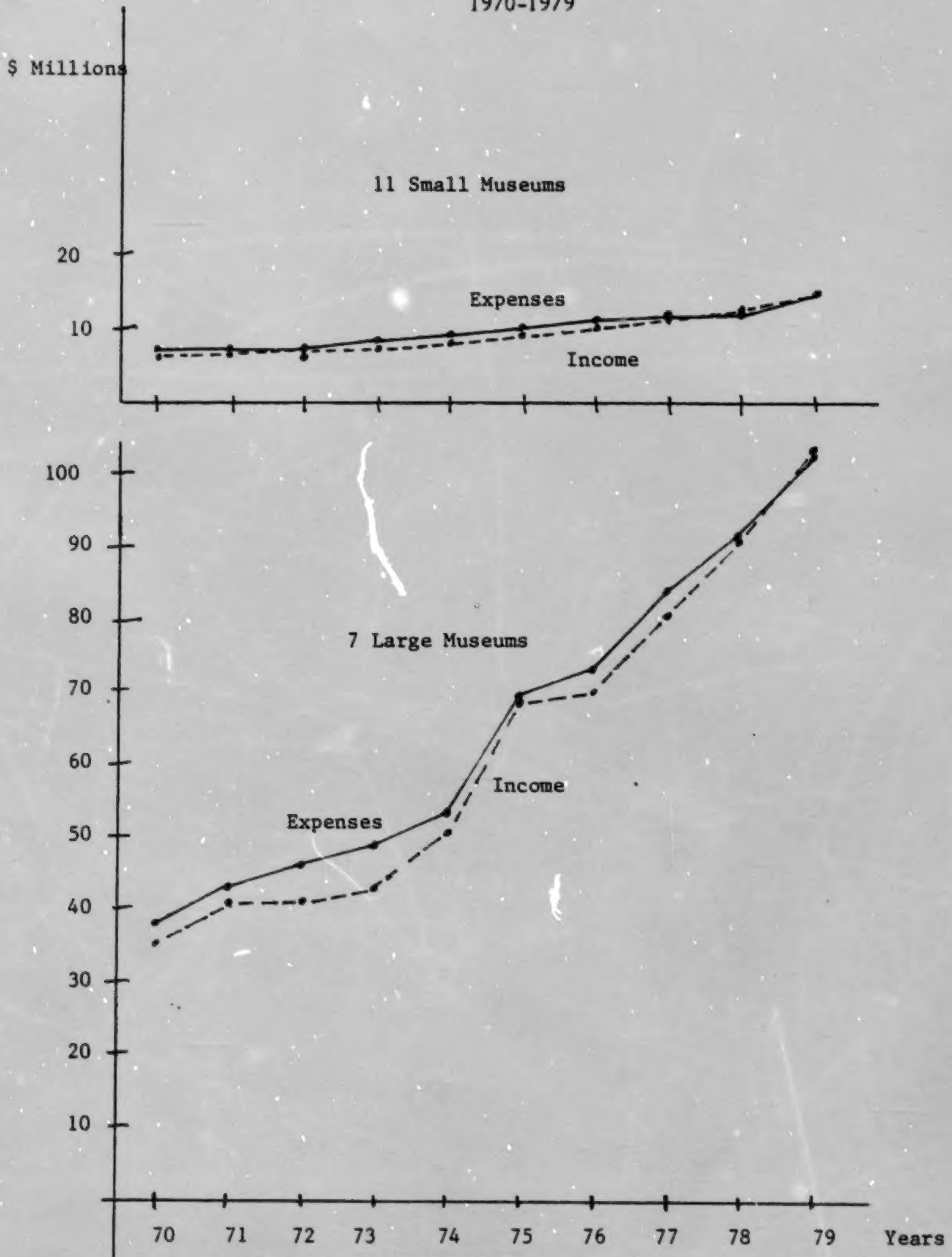
Since data in past surveys have been based on operating funds, the difference in these pictures may help explain why although museums had reported deficits, they have not had to close the doors. For many have had non-operating funds to draw upon. The deficits in the total funds in the mid 70's (Figure 9-9) may reflect in large part the response to the increased programs that museums were being asked to provide to the public. The other interesting observation is that at the end of the decade, the operating fund had smaller deficits and even a surplus year, possibly indicating more cost conscious management.

Stratifying the sample of 18 museums reporting on the operating fund into small and large categories and the sample of 14 museums reporting all funds into small, medium, and large categories shows that the basic picture of surpluses and deficits is the same (Figures 9-10 and 9-11 and Tables 9-16, 9-17 and 9-27, 9-28). The similar behavior of the smaller museums adds confidence that such behavior is not only characteristic of the large museums which strongly weight the total sample. Finally, to be sure that the different museums in the operating fund and total funds samples did not provide an incorrect picture, we examined those museums which reported both operating and total funds. Figures 9-12 and 9-13 show a similar picture:

- even growth of the operating fund's income and expenses in comparison to the more erratic growth of the total of all funds; and
- the surpluses of the total of all funds versus the deficits of the operating fund.

This sample of six museums is dominated by large museums which would be expected to have large non-operating funds. Figures 9-12 and 9-13 show that if an analysis is made of only the operating fund, then the full picture is not reflected. Most revenue (earned income) is accounted for in the operating fund, whereas a large part of support income (grants and contributions) goes into non-operating funds. Therefore, it is possible that previous surveys have understated the support given to museums. Also, especially in terms of endowment gifts, most of the funding to non-operating funds comes from private sources, thus under-reflecting

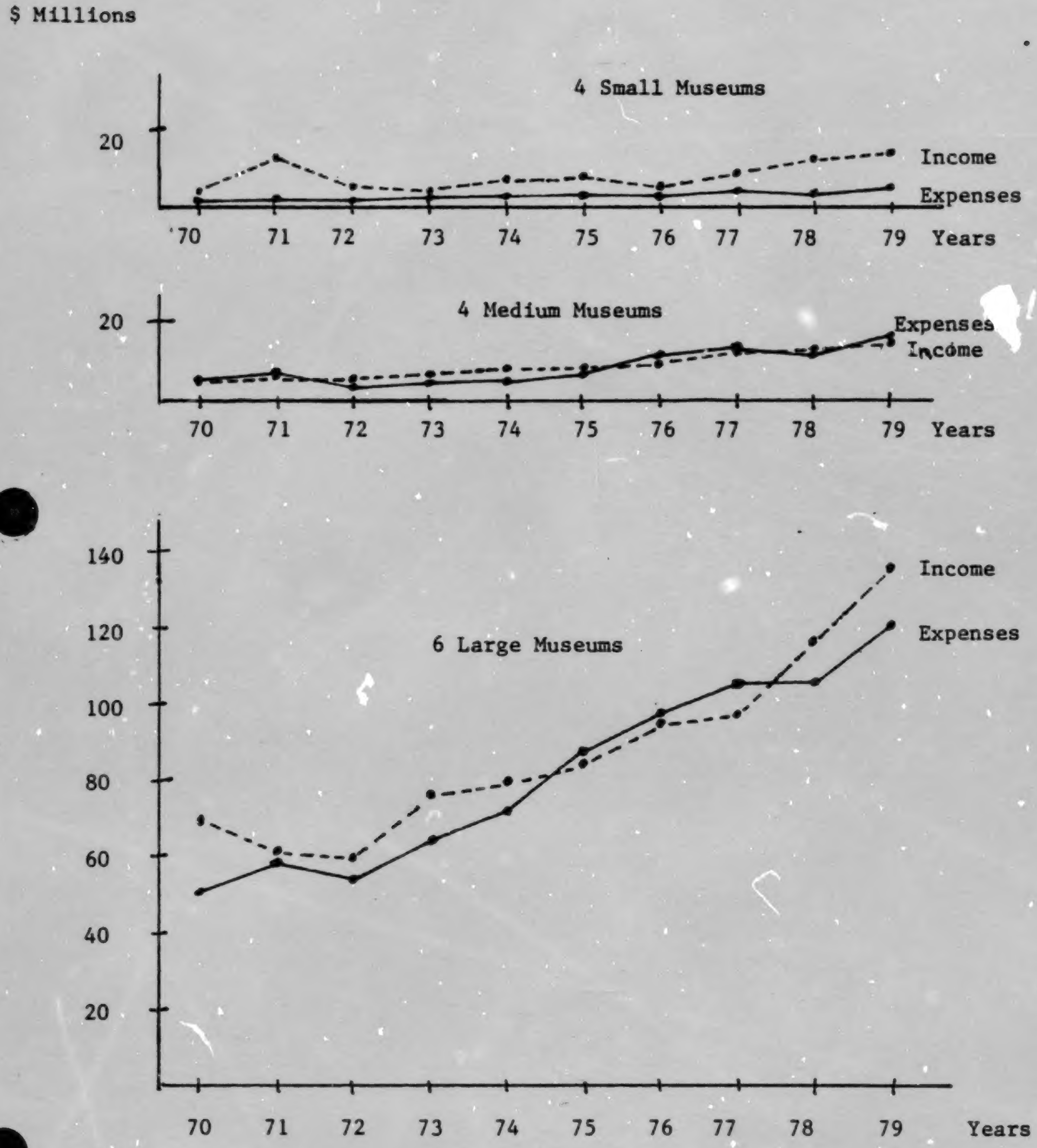
OPERATING FUND INCOME AND EXPENSES
11 Small and 7 Large Museums
1970-1979



Source of data: Individual museum statements
Data are in Tables 9-16 and 9-17.

FIGURE 9 - 10

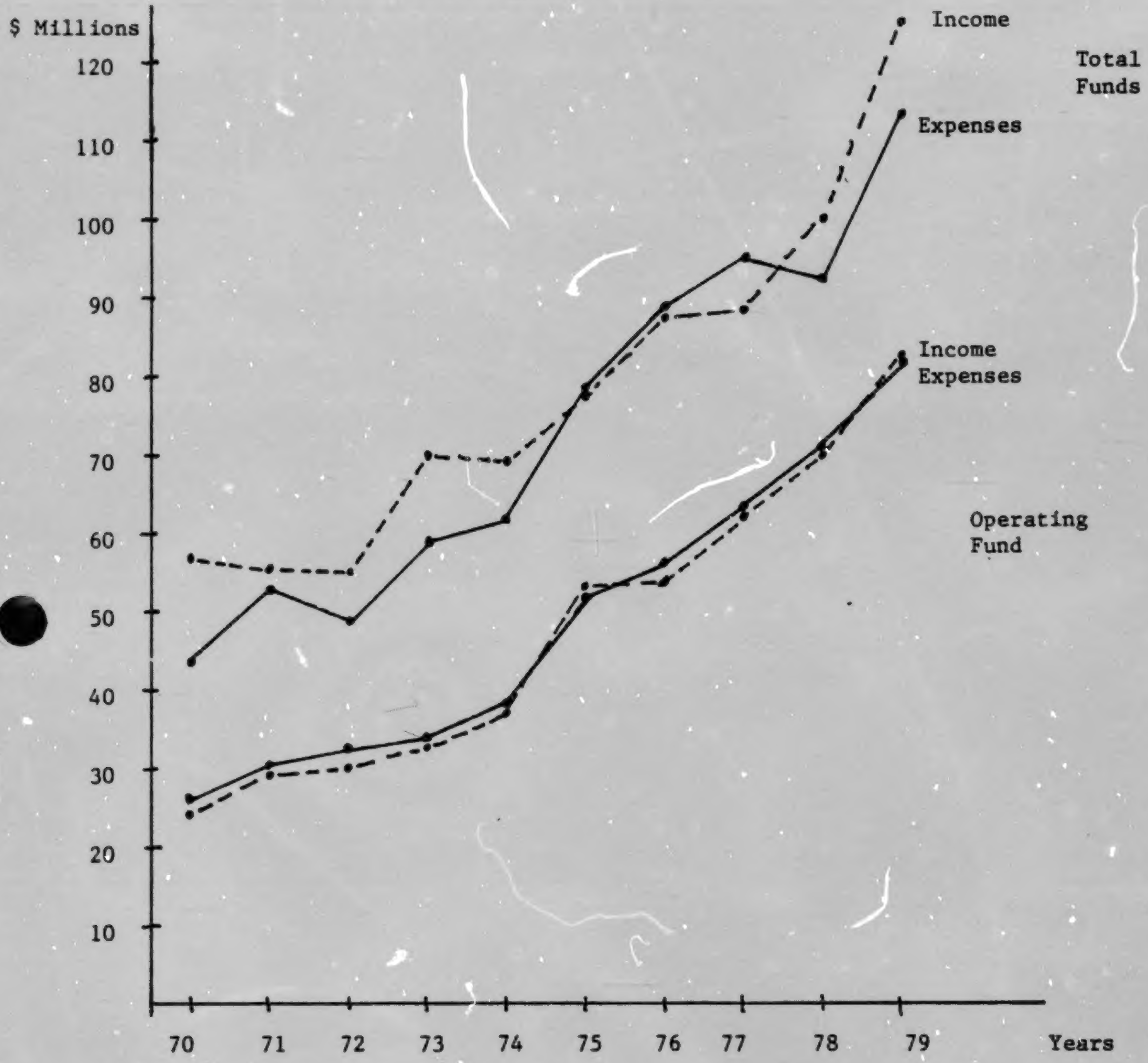
TOTAL FUNDS INCOME AND EXPENSES
4 Small, 4 Medium, and 6 Large Museums
1970-1979



Source of data: Individual museums financial statements.
Data are in Tables 9-27 and 9-28.

FIGURE 9 - 11

INCOME AND EXPENSES
Operating Fund and Total Funds
6 Museums
1970-1979

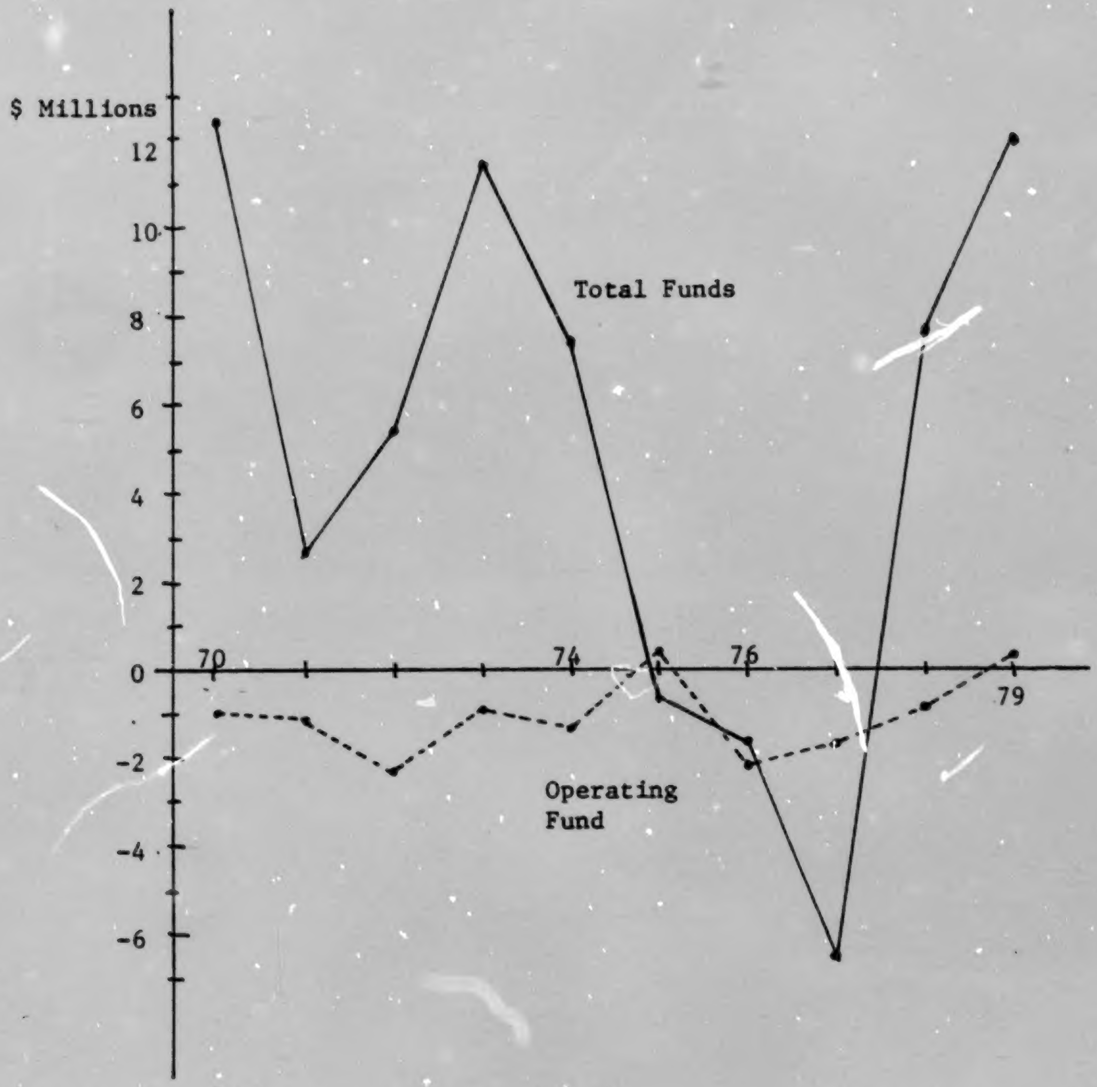


Source of data: Individual museum financial statements.
Data are in Tables 9-34, 9-35, 9-37, and 9-38.

FIGURE 9 - 12

OPERATING FUND AND TOTAL FUNDS
Surplus/(Deficit)

1970-1979



Source of data: Individual museum financial statements. Data are in Tables 9-36 and 9-39.

FIGURE 9 - 13

private versus government support if only the operating fund is examined. The conclusion to be drawn is the need to look at all funds in museums and other larger arts organizations. We should reiterate that museum boards and management may not always have the ability to use all non-operating funds and thus, large deficits in the operating fund can have a significant negative impact on the ability of a museum to function. However, if one is looking at giving to museums, one certainly wants to include the gifts to these non-operating funds to get a full picture of support and long term financial health.

GROWTH OF INCOME AND EXPENSES

Figure 9-14 presents the growth rates for income and expenses for the total sample of 26 museums and the various subsamples as previously stratified by type of financial reporting and budget size. Several conclusions emerge:

1. The growth of the museums was in the range of the various performing arts as seen in previous chapters albeit at the lower end of the range.

2. If one compares the growth rates for the following pairs of subsamples:

   a) 18 reporting operating fund versus 14 reporting all funds,

   b) 7 large reporting operating fund versus 6 large reporting all funds, and

   c) 6 reporting operating fund versus the same 6, reporting their total of all funds

   it is clear that the museums reporting on the operating fund had larger rates of growth than those reporting total funds, especially for income. For the subsample of 6 museums reporting both operating and total funds, the operating fund was about

GROWTH RATES OF INCOME AND EXPENSES
Various Samples of Museums
1970-1979

Samples		Growth Rate For Income	Growth Rate For Expenses
26	Museums - total sample	8.64	10.15
18	Museums - reporting operating fund	12.50	11.81
11	Small Museums - reporting operating fund	10.55	10.48
7	Large Museums - reporting operating fund	12.80	12.00
14	Museums - reporting all funds	8.51	10.65
4	Small Museums - reporting all funds	6.91	12.74
4	Medium Museums - reporting all funds	12.00	12.93
6	Large Museums - reporting all funds	8.50	10.31
6	Museums reporting both operating funds and all funds	14.35 8.98	13.76 10.77

Figure 9-14

half of the total organizations' financial activity in 1970, while by 1979 it was roughly 2/3.

It should be recalled that all of these subsamples contain 4 of the largest museums of our sample in common and, therefore, are heavily weighted by them. One can thus only conclude that for the same large museums, operating funds grew faster than total funds over the decade. This was perhaps due to the depletion of their endowment balances and hence their shift to increased earned income especially from auxiliary income (as will be seen later) which is mostly accounted for in the operating fund.

3. Turning to a comparison of smaller museums (i.e. the 11 reporting operating fund versus the 4 small and 4 medium reporting all funds), it would appear that here the reverse was true: total funds growing faster than operating funds (save for one exception). However, this cannot be definitively concluded as there are only two common museums (one small and one medium) in these subsamples, and the subsample sizes are small.

TYPES OF MUSEUMS

The initial sample of 45 museums was reflective of the universe in terms of governing authority. However, both the government-owned museums (public) and the university-based museums had a harder time providing data. Therefore, the samples of university and public museums are smaller than desired. Figures 9-15 and 9-16 show income and expenses (with the resulting surplus/deficit) for 19 private, 4 public, and 4 university museums[11] and earnings gap for the private and public groups.

The pattern of surpluses and deficits, as shown in Figure 9-15, is the same for all three groups: surpluses in the early years of the decade, deficits just after the midpoint of the decade, and ending with surpluses. However, the private group outgrew both the university and public groups.

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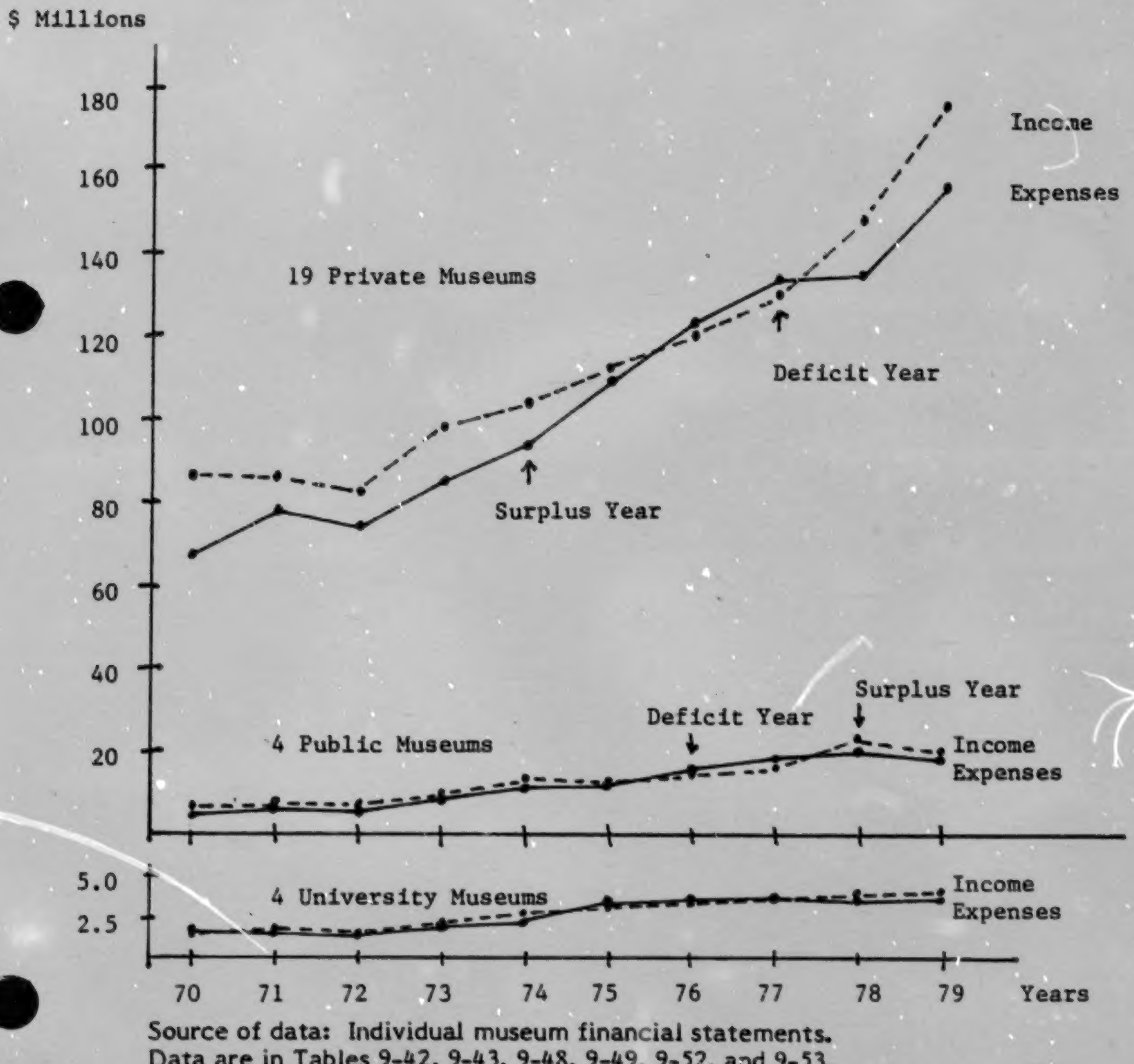
[11] Imputed data for one unversity museum, in 1970 allowed the subsample to be expanded to 4 university museums. This museum is not included in the basic sample of 26 museums.

INCOME AND EXPENSES
(Showing Surplus/(Deficit))
19 Private Museums, 4 Public (Government) Museums
and 4 University Museums
1970-1979

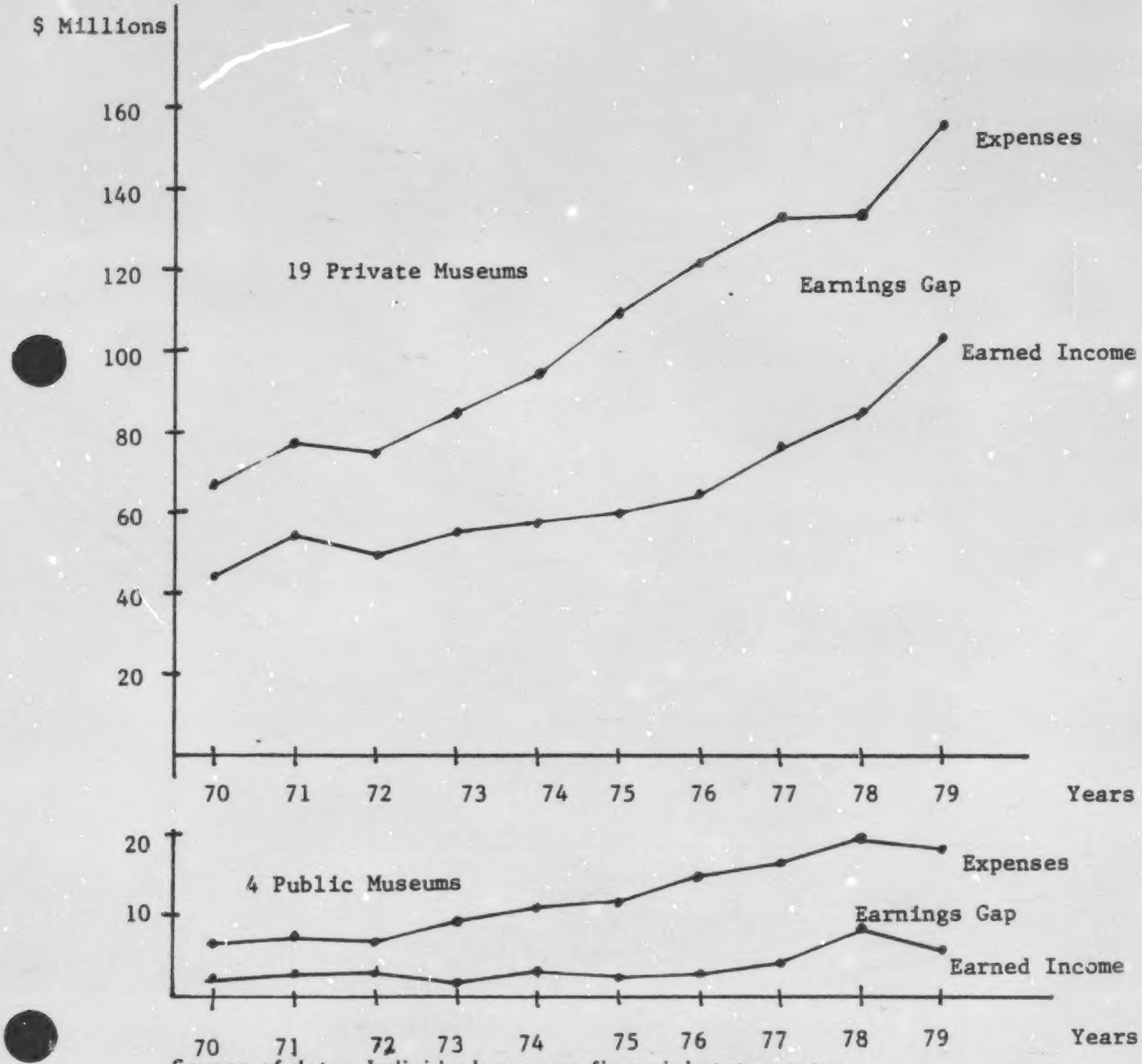


Source of data: Individual museum financial statements.
Data are in Tables 9-42, 9-43, 9-48, 9-49, 9-52, and 9-53.

FIGURE 9 - 15

EARNINGS GAP

19 Private and 4 Public Museums
1970-1979



Source of data: Individual museum financial statements.
Data are in Tables 9-40, 9-43, 9-45, 9-46, 9-49, and 9-51.

FIGURE 9 - 16

Because of gaps in the data, earned income for university museums was unavailable. However, for the other two samples, the data show a growing earnings gap (Figure 9-16). As was discussed earlier in the chapter, the earnings gap does not have the same meaning in museums as in performing arts organizations. However, this growing gap does mean that the museums had to find more support income to fill that gap. Figure 9-15 indicates that the museums did exactly that, since the last two years were surplus years. Tables 9-43, 9-49, and 9-53 show that the public museums grew the fastest (14.10 percent) and the university museums the slowest (8.43 percent). Private museums grew at 9.76 percent.

PATTERNS OF GROWTH OF INCOME

Figure 9-17 and Tables 9-55 through 9-60 show the growth and change in the components of income for 17 museums (as listed on Figure 9-2). Admissions income was unavailable; however, seven of the 33 museums' annual reports specifically reported the institution of an admission charge at some point in this decade. This was usually accompanied by the president of the board stating that, against their wishes, the board had to set an admission charge because of the deficits of the previous years. Therefore, admission income apparently grew over the decade. (Table 9-63 shows attendance figures for a small sample of museums. Attendance did not fall and thus income from admissions would rise.) Figure 9-17 shows that investment income fell sharply over the decade, while auxiliary income (from operations of restaurants, cafeterias, parking lots, museum gift shops, etc.) grew dramatically. The loss of investment income was due to several factors: weak stock market and marginal economic climate throughout much of the decade, and invasion of endowment principal to cover increased expenses of the museums, as will be shown below. Investment income grew at a rate of 2.21 percent over the decade (which in real terms had a negative growth) as compared to membership income (11.18 percent) and auxiliary income (18.84 percent).

Although both earned and support income grew at very similar rates, Figure 9-18 shows that much of the growth of earned income came in the second half of the decade, while support income rose in the early part of the decade, flattened out in the middle, and rose again at the end of the decade. The one erratic point in the earned income curve came from a good investment year in 1971. Except for that year, earned income showed a steady rise over the decade, with auxiliary income climbing steadily from$7.79 million to $34.90 million (a four-fold increase).

PERCENTAGE DISTRIBUTION OF COMPONENTS OF INCOME

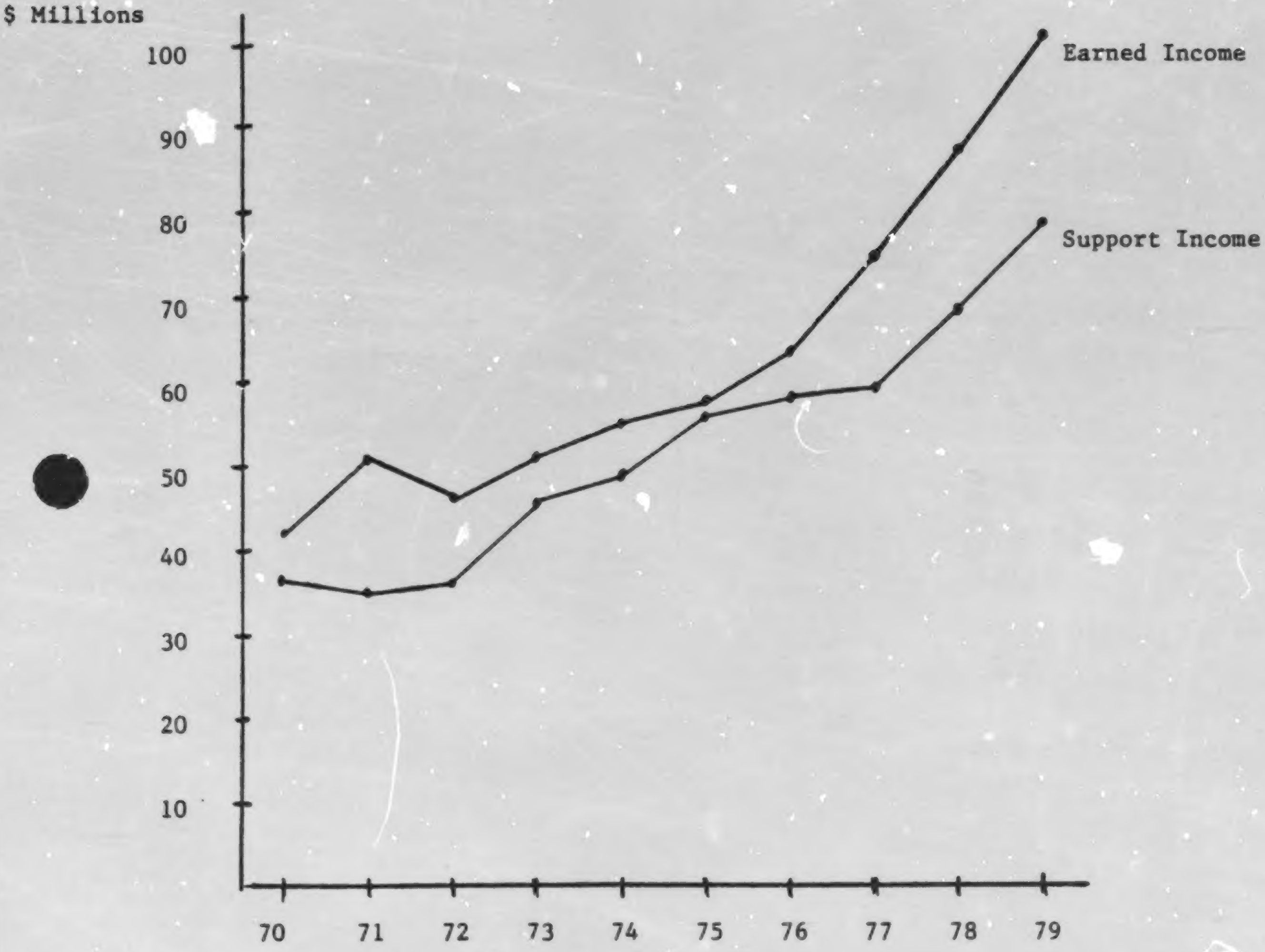
17 Museums
1970-1979

Components of Income	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Membership	9	9	10	9	9	9	10	10	11	11
Investment	54	54	42	40	44	37	36	32	30	31
Auxiliary	18	18	22	23	25	30	31	36	37	34
Other Earned Income, Including Admissions	19	19	26	28	22	24	23	22	22	24
Total Earned Income	100	100	100	100	100	100	100	100	100	100
Earned Income	53	60	57	53	53	50	52	56	56	57
Support Income	47	40	43	47	47	50	48	44	44	43
Total Income	100	100	100	100	100	100	100	100	100	100

Source of data: Individual museum financial statement.
Data are in Tables 9-55 through 9-60.

Figure 9-17

SUPPORT AND EARNED INCOME
17 Museums
1970-1979



Source of Data: Individual museum financial statements.
Data are in Tables 9-58 and 9-60.

FIGURE 9 - 18

During this period of time, there was no large unified grant program for museums similar to the Ford Foundation or Mellon Foundation programs[12] (see Chapters 5 and 6 for discussion of these programs). However, the National Endowment for the Arts Challenge Grant program did provide funding to museums. This is in part reflected in the growth of support income at the end of the decade as shown in Figure 9-18. Sixteen of the sample of 33 museums got Challenge Grant funds (see Figure 9-19). The 17 museums in the income analysis received over $5 million in grants (two museums were parts of consortia and actual figures for these museums were unavailable). Table 9-59 shows that support income grew about $10 million per year for these 17 museums during the last two years, whereas the growth in the previous year (1976 to 1977) had been about $.33 million and about $2.5 million the year before (1975 to 1976). Therefore, the Challenge Grant Program does seem to have been the catalyst for spurring growth in support income.

The other interesting point to note from Figure 9-18 is the purpose of the grants. Much of the funding ended in non-operating funds. In fact, one Challenge Grant was given to a separate fund raising organization created by the Brooklyn Museum. The Brooklyn Institute of Arts and Sciences (the umbrella over the Brooklyn Museum) 1980 Audit had the following footnote:

> The Brooklyn Museum Fund, Inc. was established on July 27, 1978 to solicit contributions for the Brooklyn Museum. Funds in the amount of ... were raised by the Brooklyn Museum Fund, Inc. through June 30, 1980. ... of this amount has been transferred to the Brooklyn Institute of Arts and Sciences for the purpose of the Brooklyn Museum by June 30, 1980 and is accordingly reflected in the attached financial statements. The remainder of the ... has been retained and invested separately by the BMF, Inc.
>
> (note 4, 1980 audit)

This financial activity corresponds to the Challenge Grant given to the Brooklyn Museum Fund, Inc. in 1978. This example has been included to point out that tracing the funds through organizations has to be done carefully. Not only is it important to examine non-operating funds, but

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[12] Some museums did receive grants from these foundations.

CHALLENGE GRANT RECIPIENTS

Museums	Purpose
Recipients of '77 and '78 Grants	
Brooklyn Museum	endowment, programs
* Art Institute, Chicago	annual deficit, achieve financial stability
* Denver Art Museum	construction debt, endowment, increased costs
* Metropolitan Museum	increased costs, endowment
* Museum of Modern Art	endowment, expand facilities, programs
* Walker Art Center	endowment, deficit, programs

St. Louis Art Museum: part of Greater St. Louis Arts Education Council Consortium--one of 11 organizations.

Recipients of '79 Grants

Museums	Purpose
* Field Museum	general
Fogg Museum	endowment, programs
Indianapolis Art Museum	endowment
* Museum of Fine Arts, Boston	endowment, deficit from construction
* Museum of Fine Arts, Houston	endowment for construction
Seattle Art Museum	endowment, construction, programs
Wadsworth Atheneum	endowment, cash reserve
Yale Museum	endowment, programs

Cincinnati Art Museum: part of Cincinnati Institute of Fine Arts Consortium
One of 7 organizations

Total Amount, not counting consortia museums: $7,945,000

*Included in the sample of 17 Museums

FIGURE 9-19

also one must be cognizant of subsidiary organizations such as the Brooklyn Museum Fund, Inc. This complicates data collection and may render data collected only on an operating fund misleading.

MUSEUMS WITH ART SCHOOLS

Five Museums in the sample of 26 had art schools for which there were separately reported data (see Tables 9-64 through 9-73). Figure 9-20 presents the growth rates for the educational components and the usual variables of earned income, support income, and total expenses. This figure shows that for these five museums, their schools grew faster than the rest of the organization. Contributions and grants given to the school are usually buried on financial statements within the museum's support income; therefore, we could only compare tuition and contract income of the school to the museum's earned income. This educational income grew from 16 percent of earned income in 1970 to 19 percent at the end of the decade. The school's expenses grew from 15 percent of the museums' expenses in 1970 to 19 percent in 1979.

ENDOWMENT AND TOTAL FUND BALANCES OVER THE DECADE

Figure 9-21 and Tables 9-74 and 9-75 show the endowment fund balance for a sample of 12 museums and subgroups of 3 small, 4 medium, and 5 large museums. The figure shows no actual growth in the endowments of these museums and a significant drop in the real (constant dollar) value of the endowments. When the sample is split by budget size (same as for the groupings of museums reporting total of all funds), the picture changes. The small museums were able to increase their endowments, the medium sized museums had small actual growth and negative real growth, and the large museums did rather poorly over the decade, with several museums having to invade their endowments to cover deficits.[13/] This is, of course, reflected in the amount of investment income which is derived from these endowments. To have kept pace with inflation, these 12 museums should have increased their endowments from $313 million in 1970 to about $580 million by 1979. Instead, they ended the decade at $328.93 million. Clearly, the large museums' endowments were a victim of the inflationary decade of the 1970s.

[13/] Virtually all the endowment is held by large museums ($300 of $313 million in 1970 and $311 of $329 million in 1979).

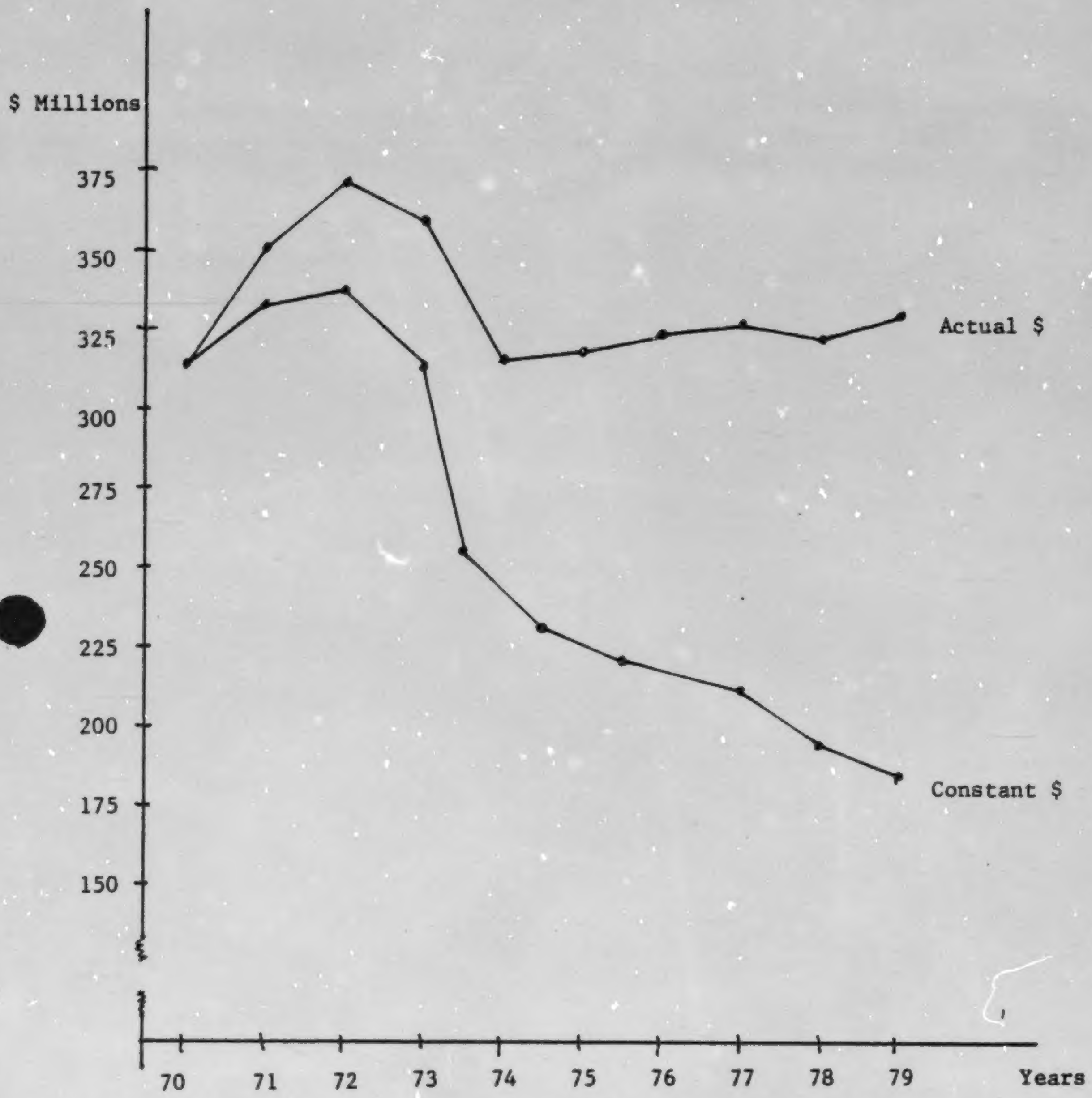
GROWTH RATES OF
5 MUSEUMS WITH ART SCHOOLS
1970-1979

Economic Variables	Growth Rate	Amount in FY70 ($ Millions)	Amount in FY79 ($ Millions)
Educational Income (mostly Tuition & Fees)	12.36%	$ 2.47	$ 7.24
Earned Income	9.87%	$15.46	$37.28
Support Income	6.38%	$15.91	$24.54
Educational Expenses	11.27%	$ 3.14	$ 8.47
Total Expenses	10.01%	$21.04	$44.67

Data are in Tables 9-65 through 9-73.

FIGURE 9-20

ENDOWMENT FUND BALANCE
12 Museums
1970-1979



Source of data: Individual museum financial statements.
Data are in Table 9-74.

FIGURE 9 - 21

Table 9-76 shows the total fund balance of these 12 museums over the decade. The growth of the total fund balance was marginally better than the endowment fund balance. Since the endowment is such a large part of the total fund balance of these 12 museums, one would expect that since the endowments did so poorly, so too should the total fund balance. However, the endowment was 82 percent of the total fund balance in 1970 and fell to 67 percent in 1979. In fact the total sample of 26 accumulated a surplus of almost $100 million over the decade. This was caused in part by building programs pursued by many of these museums during the decade. There were no reliable data on expenditures for new buildings and facilities, but many annual reports gave glowing accounts of ground breaking ceremonies and later, parties to celebrate the opening of new galleries and facilities. Of the 33, seventeen museums reported building or major renovation campaigns in their annual reports or financial statements. Therefore, it is clear that substantial growth occurred in this area which would be reflected in the growth of the total fund balance.

THE MUSEUM UNIVERSE: AN OVERVIEW

This chapter has derived for the samples under consideration the following major conclusions:

1. Overall growth of the museums was in the range of the various performing arts discussed in previous chapters, though on the low end.

2. The behavior of the operating funds and total funds over the decade differed immensely in that:

   a) while the operating funds exhibited a deficit for all years except 1979, the total funds showed a surplus for all but two years, and

   b) the total income and expenses of the operating fund exhibited rather even growth in comparison to the more erratic growth of those for all funds.

These differences highlight the danger of looking at only the operating fund when analyzing museums.

3. There was a sharp drop in the real (constant dollar) endowment fund balance over the decade, especially for the large museums, caused in part by the invasion of endowment capital to cover operating fund deficits. This resulted in a drop in investment income. There was also a shift to increased earned income especially from auxiliary activities. At the same time, the total fund balance showed an increase. In fact, the total sample of 26 museums accumulated a surplus of almost $100 million over the decade. But the inflationary economy of the decade negated all real growth in the fund balance.

4. As with the performing arts, the introduction of the Challenge Grant Program at the end of the decade appears to have spurred growth in support income.

It is true that the samples of 26 over the decade and 33 for 1973-79 are small relative to the much larger museum universe described in Chapter 3. However, it should be recalled that these were samples from a sub-universe of museums that consisted of art museums and other types of museums that had a significant collection of art. If one compares the total budget size of the samples with that of the sub-universe of reference (see Figure 3-45) and with the total budgetsize of larger museums (see Figure 3-47), it is obvious that in dollar value, these samples represent a significant chunk of these sub-universes. Hence, one can reasonably infer that these samples are quite representative of at least the sub-universe of large art and art-related museums. This is especially strengthened by the consistency of results across the subsamples so that it is not a result solely of the few extremely large museums in the samples.

As usual, the greater the gap between the frame (sample) and the universe, the less reliable are estimates regarding the universe. Of course, it would be risky to extrapolated from these samples to the complete museum universe (more than 4400 museums) which covers science museums, historic buildings, visitor and park centers, aquaria and zoos, and so on. The museums with art collections may or may not have similar economic activity as these other types. One is then left with the observations of Chapter 3 on how the universe of museums has grown and the museums themselves have grown.

TABLE 9-1

TOTAL INCOME ($ Millions)
26 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	96.63	98.16	93.32	111.74	120.08	128.13	137.43	150.05	174.81	200.54	Growth Rate: Standard Deviation:	8.64% .34
Dollars Deflated By Implicit GNP Deflator	96.63	93.29	84.78	96.94	96.77	93.17	93.65	97.18	106.41	112.16	Growth Rate: Standard Deviation:	1.71% .29
Dollars Deflated By Consumer Price Index	96.63	93.36	85.65	98.65	97.23	93.43	93.57	96.57	105.42	110.56	Growth Rate: Standard Deviation:	1.50% .27

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-2

TOTAL EXPENSES ($ Millions)
26 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	77.10	87.75	84.51	97.48	107.91	125.49	139.99	153.74	158.46	179.13	Growth Rate: Standard Deviation:	10.15% .24
Dollars Deflated By Implicit GNP Deflator	77.10	83.39	76.78	84.58	86.97	91.25	95.39	99.58	96.46	100.19	Growth Rate: Standard Deviation:	3.13% .17
Dollars Deflated By Consumer Price Index	77.10	83.45	77.57	86.06	87.38	91.50	95.31	98.95	95.56	98.76	Growth Rate: Standard Deviation:	2.92% .17

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-3

SURPLUS/(DEFICIT) ($ Millions)
26 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
ctual ollars	19.53	10.42	8.81	14.58	12.17	2.64	-2.56	-3.69	16.35	21.41
ollars Deflated By nplicit GNP Deflator	19.53	9.90	8.00	12.65	9.81	1.92	-1.74	-2.39	9.95	11.97
ollars Deflated By onsumer Price Index	19.53	9.91	8.08	12.87	9.85	1.93	-1.74	-2.38	9.86	11.80

ata deflated using indices readjusted to FY70 as the base.
ource of data: Individual organization financial statements.

TABLE 9-4

TOTAL INCOME ($ Millions)
33 Museums

	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	120.36	127.61	136.96	146.71	170.30	186.86	228.61	Growth Rate: Standard Deviation:	10.93% .47
Dollars Deflated By Implicit GNP Deflator	104.42	102.84	99.59	99.97	110.29	113.75	127.86	Growth Rate: Standard Deviation:	3.31% .51
Dollars Deflated By Consumer Price Index	106.25	103.34	99.87	99.89	109.60	112.69	126.03	Growth Rate: Standard Deviation:	2.82% .52

Data deflated using indices readjusted to FY70 as the base. Growth Rate calculated over 7 years.
Source of data: Individual organization financial statements.

TABLE 9-5

TOTAL EXPENSES ($ Millions)
33 Museums

	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	103.16	114.40	132.93	148.30	162.86	168.12	196.73	Growth Rate: Standard Deviation:	10.95% .30
Dollars Deflated By Implicit GNP Deflator	89.50	92.20	96.66	101.06	105.48	94.03	110.03	Growth Rate: Standard Deviation:	3.32% .19
Dollars Deflated By Consumer Price Index	91.07	92.64	96.93	100.97	104.81	101.39	108.46	Growth Rate: Standard Deviation:	2.84% .18

Data deflated using indices readjusted to FY70 as the base. Growth Rate calculated over 7 years.
Source of data: Individual organization financial statements.

TABLE 9-6

SURPLUS/(DEFICIT) ($ Millions)
33 Museums

	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	17.53	13.21	4.03	-1.59	7.44	18.74	31.88
Dollars Deflated By Implicit GNP Deflator	15.21	10.65	2.93	-1.08	4.82	11.41	17.83
Dollars Deflated By Consumer Price Index	15.48	10.70	2.94	-1.08	4.79	11.30	17.58

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-7

TOTAL INCOME ($ Millions)
Comparison: 26, 27, 33 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	FY80	
26 Museums FY70-FY79	96.63	98.16	93.32	111.74	120.08	[illegible]	137.43	150.05	174.81	200.54	NA	Growth Rate: 8.64% Standard Deviation: .34
27 Museums FY71-FY80	NA	91.12	86.34	104.52	110.85	120.50	129.03	138.39	162.62	195.16	204.71	Growth Rate: 10.14% Standard Deviation: .31
33 Museums FY73-FY79	NA	NA	NA	120.04	127.61	136.96	146.71	170.30	186.86	228.61	NA	Growth Rate: 10.93% Standard Deviation: .47

Source of data: Individual organization financial statements.

TABLE 9-8

TOTAL EXPENSES ($ Millions)
Comparison: 26, 27, 33 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	FY80	
26 Museums FY70-FY79	77.10	87.75	84.51	97.48	107.91	125.49	139.99	153.74	158.46	179.13	NA	Growth Rate: 10.15% Standard Deviation: .24
27 Museums FY71-FY80	NA	80.50	77.16	90.01	97.06	116.67	131.73	143.01	146.47	173.71	191.67	Growth Rate: 10.99% Standard Deviation: .27
33 Museums FY73-FY79	NA	NA	NA	103.16	114.40	132.93	148.30	162.86	168.12	196.73	NA	Growth Rate: 10.95% Standard Deviation: .30

Source of data: Individual organization financial statements.

TABLE 9-9

SURPLUS/(DEFICIT) ($ Millions)
Comparison: 26, 27, 33 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	FY80
26 Museums FY70-FY79	19.53	10.42	8.81	14.58	12.17	2.64	-2.56	-3.69	16.35	21.41	NA
27 Museums FY71-FY80	NA	10.62	9.17	14.50	13.79	3.83	-2.70	-4.62	16.15	21.45	13.04
33 Museums FY73-FY79	NA	NA	NA	17.53	13.21	4.03	-1.59	7.44	18.74	31.89	NA

Source of data: Individual organization financial statements.

TABLE 9-10

OPERATING FUND INCOME ($ Millions)
18 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	41.76	47.85	50.58	54.63	59.66	78.23	81.22	93.47	104.32	119.23	Growth Rate: Standard Deviation:	12.50% .26
Dollars Deflated By Implicit GNP Deflator	41.76	45.47	45.95	47.40	48.08	56.88	55.35	60.54	63.51	66.68	Growth Rate: Standard Deviation:	6.33% .18
Dollars Deflated By Consumer Price Index	41.76	45.50	46.43	48.23	48.31	57.04	55.30	60.15	62.91	65.73	Growth Rate: Standard Deviation:	5.11% .16

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-11

OPERATING FUND EXPENSES ($ Millions)
18 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	44.18	50.01	53.39	57.01	62.84	79.74	84.62	95.78	104.97	118.51	Growth Rate: Standard Deviation:	11.81% .22
Dollars Deflated By Implicit GNP Deflator	44.18	47.53	48.51	49.46	50.64	57.99	57.67	62.04	63.90	66.28	Growth Rate: Standard Deviation:	4.68% .14
Dollars Deflated By Consumer Price Index	44.18	47.56	49.01	50.33	50.89	58.15	57.62	61.65	63.30	65.33	Growth Rate: Standard Deviation:	4.46% .13

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-12

OPERATING FUND SURPLUS/(DEFICIT) ($ Millions)
18 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	-2.43	-2.17	-2.81	-2.05	3.18	-1.57	-3.40	-2.32	-.64	.73
Dollars Deflated By Implicit GNP Deflator	-2.43	-2.06	-2.56	-1.78	-2.56	-1.14	-2.32	-1.50	.39	.41
Dollars Deflated By Consumer Price Index	-2.43	-2.06	-2.58	-1.81	-2.58	-1.14	-2.32	-1.49	-.39	.40

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-13

OPERATING FUND INCOME ($ Millions)
25 Museums

	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	60.79	66.91	85.95	89.29	104.03	114.55	134.65	Growth Rate:	13.93%
								Standard Deviation:	.39
Dollars Deflated By Implicit GNP Deflator	52.74	53.92	62.50	60.84	67.38	69.73	75.31	Growth Rate:	6.10%
								Standard Deviation:	.29
Dollars Deflated By Consumer Price Index	53.64	54.18	62.67	60.80	66.95	69.08	74.23	Growth Rate:	5.60%
								Standard Deviation:	.29

Data deflated using indices readjusted to FY70 as the base. Growth Rate calculated over 7 years.
Source of data: Individual organization financial statements.

TABLE 9-14

OPERATING FUND EXPENSES ($ Millions)
25 Museums

	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	62.40	69.24	87.09	92.46	105.75	115.09	132.45	Growth Rate:	13.19%
								Standard Deviation:	.35
Dollars Deflated By Implicit GNP Deflator	54.14	55.80	63.33	63.01	68.49	70.06	74.08	Growth Rate:	5.41%
								Standard Deviation:	.23
Dollars Deflated By Consumer Price Index	55.09	56.07	63.50	62.95	68.05	69.41	73.02	Growth Rate:	4.91%
								Standard Deviation:	.23

Data deflated using indices readjusted to FY70 as the base. Growth Rate calculated over 7 years.
Source of data: Individual organization financial statements.

TABLE 9-15

OPERATING FUND SURPLUS/(DEFICIT) ($ Millions)
25 Museums

	FY73	FY74	FY75	FY76	FY77	FY78	FY79
ctual ollars	-1.28	-2.33	-1.18	-3.18	-1.72	-0.54	2.20
ollars Deflated By nplicit GNP Deflator	-1.11	-1.88	-0.86	-2.17	-1.14	-0.33	1.23
ollars Deflated By onsumer Price Index	-1.13	-1.87	-0.86	-2.17	-1.11	-0.32	1.21

ata deflated using indices readjusted to FY70 as the base. Growth Rate calculated over 7 years.
ource of data: Individual organization financial statements.

TABLE 9-16

OPERATING FUND INCOME ($ Millions)
Comparison: 11 Small and 7 Large Museums Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
11 Small Museums	5.83	6.47	7.80	7.65	8.65	9.63	10.60	11.51	13.27	14.98	Growth Rate: Standard Deviation:	10.55% .19
7 Large Museums	35.93	41.38	42.78	46.98	51.01	68.60	70.62	81.96	91.05	104.26	Growth Rate: Standard Deviation:	12.80% .30
18 Museums	41.76	47.85	50.58	54.63	59.66	78.23	81.22	93.47	104.32	119.23	Growth Rate: Standard Deviation:	12.50% .26

Source of data: Individual organization financial statements.

TABLE 9-17

OPERATING FUND EXPENSES ($ Millions)
Comparison: 11 Small and 7 Large Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
11 Small Museums	6.10	6.69	7.18	7.96	9.05	10.32	11.35	11.72	13.12	14.98	Growth Rate: Standard Deviation:	10.48% .14
7 Large Museums	38.09	43.32	46.22	49.05	53.79	69.42	73.28	84.06	91.84	103.53	Growth Rate: Standard Deviation:	12.0% .25
18 Museums	44.18	50.01	53.39	57.01	62.84	79.74	84.62	95.78	104.97	118.51	Growth Rate: Standard Deviation:	11.81% .22

Source of data: Individual organization financial statements.

TABLE 9-18

OPERATING FUND SURPLUS/(DEFICIT) ($ Millions)
Comparison: 11 Small and 7 Large Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Small useums	-.27	-.22	.63	-.32	-.39	-.74	-.75	-.21	.15	-.00
arge useums	-2.16	-1.94	-3.44	-1.74	-2.79	-.82	-2.65	-2.10	-.79	.73
Museums	-2.43	-2.17	-2.81	-2.05	-3.18	-1.57	-3.40	-2.32	-.64	.73

urce of data: Individual organization financial statements.

TABLE 9-19

TOTAL ALL FUNDS - EARNED INCOME ($ Millions)
14 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	36.49	46.27	40.23	46.34	49.20	50.63	56.90	65.37	77.48	91.36	Growth Rate: Standard Deviation:	9.48% .49
Dollars Deflated By Implicit GNP Deflator	36.49	43.97	36.55	40.20	39.65	36.81	38.77	42.34	47.17	51.10	Growth Rate: Standard Deviation:	2.50% .45
Dollars Deflated By Consumer Price Index	36.49	44.00	36.93	40.19	39.84	36.92	38.74	42.07	46.73	50.37	Growth Rate: Standard Deviation:	2.29% .43

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-20

TOTAL ALL FUNDS - SUPPORT INCOME ($ Millions)
14 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	43.31	33.77	33.09	44.39	48.37	52.30	53.66	53.32	63.20	72.46	Growth Rate: Standard Deviation:	7.58% .61
Dollars Deflated By Implicit GNP Deflator	43.31	32.09	30.06	38.51	38.99	38.03	36.56	34.53	38.47	40.52	Growth Rate: Standard Deviation:	0.72% .55
Dollars Deflated By Consumer Price Index	43.31	32.12	30.37	39.19	39.17	38.14	36.53	34.32	38.12	39.94	Growth Rate: Standard Deviation:	0.51% .54

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-21

TOTAL ALL FUNDS - INCOME ($ Millions)
14 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	79.80	80.04	73.32	90.73	97.57	102.93	110.56	118.69	140.68	163.82	Growth Rate: Standard Deviation:	8.51% .41
Dollars Deflated By Implicit GNP Deflator	79.80	76.07	66.61	78.72	78.63	74.85	75.34	76.87	85.64	91.62	Growth Rate: Standard Deviation:	1.59% .36
Dollars Deflated By Consumer Price Index	79.80	76.12	67.30	80.10	79.01	75.05	75.28	76.39	84.84	90.31	Growth Rate: Standard Deviation:	1.38% .34

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-22

TOTAL ALL FUNDS - EXPENSES ($ Millions)
14 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	58.87	68.57	64.09	74.99	83.53	98.37	111.95	121.90	124.10	142.76	Growth Rate: Standard Deviation:	10.65% .30
Dollars Deflated By Implicit GNP Deflator	58.87	65.17	58.25	65.06	67.32	71.53	76.29	78.95	75.55	79.84	Growth Rate: Standard Deviation:	3.60% .23
Dollars Deflated By Consumer Price Index	58.87	65.21	58.83	66.20	67.64	71.73	76.22	78.45	74.84	78.70	Growth Rate: Standard Deviation:	3.39% .22

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-23

TOTAL ALL FUNDS SURPLUS/(DEFICIT) ($ Millions)
14 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	20.93	11.47	9.22	15.74	14.04	4.56	-1.39	-3.21	16.58	21.05
Dollars Deflated By Implicit GNP Deflator	20.93	10.90	8.38	13.66	11.32	3.31	-.95	-2.08	10.09	11.78
Dollars Deflated By Consumer Price Index	20.93	10.91	8.47	13.90	11.37	3.32	-.95	-2.06	10.00	11.61

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-24

TOTAL INCOME: ALL FUNDS ($ Millions)
19 Museums

	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	107.72	112.55	119.38	128.44	149.03	167.33	208.76	Growth Rate: Standard Deviation:	11.31% .61
Dollars Deflated By Implicit GNP Deflator	93.46	90.71	86.81	87.52	96.52	101.86	116.76	Growth Rate: Standard Deviation:	3.66% .64
Dollars Deflated By Consumer Price Index	95.10	91.14	87.05	87.45	95.91	100.90	115.09	Growth Rate: Standard Deviation:	3.17% .65

Data deflated using indices readjusted to FY70 as the base. Growth Rate calculated over 7 years.
Source of data: Individual organization financial statements.

TABLE 9-25

TOTAL EXPENSES: ALL FUNDS ($ Millions)
19 Museums

	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	87.81	99.93	115.31	129.12	140.30	143.76	171.62	Growth Rate: Standard Deviation:	11.05% .36
Dollars Deflated By Implicit GNP Deflator	76.18	80.54	83.85	87.99	90.87	87.51	95.98	Growth Rate: Standard Deviation:	3.41% .24
Dollars Deflated By Consumer Price Index	77.52	80.92	84.08	87.98	90.29	86.70	94.61	Growth Rate: Standard Deviation:	2.92% .23

Data deflated using indices readjusted to FY70 as the base. Growth Rate calculated over 7 years.
Source of data: Individual organization financial statements.

TABLE 9-26

TOTAL ALL FUNDS SURPLUS/(DEFICIT) ($ Millions)
19 Museums

	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	19.90	12.61	4.07	-0.68	8.73	23.57	37.15
Dollars Deflated By Implicit GNP Deflator	17.27	10.16	2.96	-0.46	5.65	14.35	20.78
Dollars Deflated By Consumer Price Index	17.57	10.21	2.97	-0.46	5.62	14.21	20.48

Data deflated using indices readjusted to FY70 as the base. Growth Rate calculated over 7 years.
Source of data: Individual organization financial statements.

TABLE 9-27

TOTAL INCOME: ALL FUNDS ($ Millions)
Comparison: 4 Small, 4 Medium, and 6 Large Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
4 Small Museums	4.71	12.28	6.17	5.66	8.57	9.36	6.08	9.68	11.64	13.11	Growth Rate: Standard Deviation:	6.91% 1.58
4 Medium Museums	4.93	6.08	6.15	7.43	8.15	8.97	9.30	11.28	13.32	14.03	Growth Rate: Standard Deviation:	12.00% .25
6 Large Museums	70.15	61.68	60.55	77.64	80.85	84.61	95.18	97.74	115.73	136.67	Growth Rate: Standard Deviation:	8.50% .48
14 Museums	79.80	80.04	73.32	90.73	97.57	102.93	110.56	118.69	140.68	163.82	Growth Rate: Standard Deviation:	8.51% .41

Source of data: Individual organization financial statements.

TABLE 9-28

TOTAL EXPENSES: ALL FUNDS ($ Millions)
Comparison: 4 Small and 4 Medium, and 6 Large Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
4 Small Museums	2.17	2.58	2.56	3.36	4.10	4.15	5.31	5.87	5.24	6.08	Growth Rate: Standard Deviation:	12.74% .55
4 Medium Museums	4.96	6.28	5.58	6.43	6.53	8.09	10.31	11.63	12.50	14.97	Growth Rate: Standard Deviation:	12.93% .55
6 Large Museums	51.75	59.71	55.96	65.20	72.89	86.14	96.33	104.39	106.37	121.72	Growth Rate: Standard Deviation:	10.31% .29
14 Museums	58.87	68.57	64.09	74.99	83.53	98.37	111.95	121.90	124.10	142.76	Growth Rate: Standard Deviation:	10.65% .30

Source of data: Individual organization financial statements.

TABLE 9-29

SURPLUS/(DEFICIT): ALL FUNDS ($ Millions)
Comparison: 4 Small and 4 Medium, and 6 Large Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Small useums	2.55	9.70	4.06	2.30	4.46	5.21	0.77	3.80	6.40	7.04
Medium useums	-.02	-.20	.57	1.00	1.63	.88	-1.01	-.35	.82	-.94
Large useums	18.40	1.97	4.60	12.44	7.95	-1.53	-1.15	-6.65	9.36	14.95
Museums	20.93	11.47	9.22	15.74	14.04	4.56	-1.39	-3.21	16.58	21.05

ource of data: Individual organization financial statements.

TABLE 9-30

INVESTMENT INCOME (ALL FUNDS) ($ Millions)
6 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	18.50	22.88	14.73	16.18	18.33	16.43	18.59	18.39	19.65	24.78	Growth Rate: Standard Deviation:	1.82% .75
Dollars Deflated By Implicit GNP Deflator	18.50	21.74	13.38	14.04	14.77	11.95	12.67	11.91	11.96	13.86	Growth Rate: Standard Deviation:	-4.67% .67
Dollars Deflated By Consumer Price Index	18.50	21.76	13.52	14.28	14.84	11.98	12.66	11.84	11.85	13.66	Growth Rate: Standard Deviation:	4.86% .65

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-31

AUXILIARY INCOME ($ Millions)
6 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	5.32	7.03	7.70	8.77	10.67	13.78	15.58	21.45	24.48	28.75	Growth Rate: Standard Deviation:	20.69% .32
Dollars Deflated By Implicit GNP Deflator	5.32	6.68	7.00	7.61	8.60	10.02	10.62	13.89	14.90	16.08	Growth Rate: Standard Deviation:	12.99% .28
Dollars Deflated By Consumer Price Index	5.32	6.68	7.07	7.75	8.64	10.05	10.61	13.80	14.76	15.85	Growth Rate: Standard Deviation:	12.76% .26

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-32

EARNED INCOME (ALL FUNDS) ($ Millions)
6 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	30.55	38.67	33.04	38.75	40.01	42.98	48.32	55.06	61.39	77.32	Growth Rate: Standard Deviation:	9.44% .49
Dollars Deflated By Implicit GNP Deflator	30.55	36.75	30.02	33.62	32.25	31.25	32.93	35.66	37.37	43.24	Growth Rate: Standard Deviation:	2.46% .44
Dollars Deflated By Consumer Price Index	30.55	36.78	30.33	34.21	32.40	31.34	32.90	35.44	37.02	42.62	Growth Rate: Standard Deviation:	2.25% .42

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-33

SUPPORT INCOME (ALL FUNDS) ($ Millions)
6 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	26.97	17.22	22.45	31.88	29.87	34.26	38.71	33.53	39.22	48.07	Growth Rate: Standard Deviation:	8.65% .86
Dollars Deflated By Implicit GNP Deflator	26.97	16.37	20.40	27.66	24.07	24.91	26.38	21.72	23.87	26.88	Growth Rate: Standard Deviation:	1.72% .80
Dollars Deflated By Consumer Price Index	26.97	16.38	20.61	28.15	24.19	24.98	26.36	21.58	23.65	26.50	Growth Rate: Standard Deviation:	1.51% .80

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-34

TOTAL INCOME (ALL FUNDS) ($ Millions)
6 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	57.52	55.89	55.49	70.63	69.88	77.24	87.03	88.59	100.61	125.38	Growth Rate: Standard Deviation:	8.98% .39
Dollars Deflated By Implicit GNP Deflator	57.52	53.12	50.41	61.28	56.32	56.16	59.31	57.38	61.25	70.12	Growth Rate: Standard Deviation:	2.04% .34
Dollars Deflated By Consumer Price Index	57.52	53.15	50.93	62.36	56.59	56.32	59.26	57.01	60.67	69.12	Growth Rate: Standard Deviation:	1.83% .33

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-35

TOTAL EXPENSES (ALL FUNDS) ($ Millions)
6 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	44.89	53.17	49.96	59.21	62.29	77.81	88.82	95.16	92.74	113.13	Growth Rate: Standard Deviation:	10.77% .36
Dollars Deflated By Implicit GNP Deflator	44.89	50.53	45.39	51.37	50.20	56.58	60.52	61.63	56.46	63.27	Growth Rate: Standard Deviation:	3.71% .29
Dollars Deflated By Consumer Price Index	44.89	50.57	45.85	52.28	50.44	56.74	60.47	61.24	55.93	62.37	Growth Rate: Standard Deviation:	3.49% .28

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-36

SURPLUS/(DEFICIT) (ALL FUNDS) ($ Millions)
6 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	12.62	2.72	5.53	11.42	7.59	-.57	-1.79	-6.57	7.87	12.25
Dollars Deflated By Implicit GNP Deflator	12.62	2.59	5.03	9.91	6.12	-.42	-1.22	-4.25	4.79	6.85
Dollars Deflated By Consumer Price Index	12.62	2.59	5.08	10.08	6.15	-.42	-1.22	-4.23	4.74	6.75

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-37

TOTAL INCOME (OPERATING FUND ONLY) ($ Millions)
6 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	24.93	29.72	30.58	33.62	37.15	52.97	54.35	62.10	70.20	82.50	Growth Rate: Standard Deviation:	14.35% .37
Dollars Deflated By Implicit GNP Deflator	24.93	28.25	27.79	29.17	29.94	38.52	37.03	40.22	42.73	46.14	Growth Rate: Standard Deviation:	7.06% .28
Dollars Deflated By Consumer Price Index	24.93	28.27	28.07	29.68	30.09	38.63	37.00	39.97	42.33	45.48	Growth Rate: Standard Deviation:	6.84% .26

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-38

TOTAL EXPENSES (OPERATING FUND ONLY) ($ Millions)
6 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	25.96	30.83	32.98	34.51	38.46	52.63	56.58	63.94	70.61	82.13	Growth Rate: Standard Deviation:	13.76% .33
Dollars Deflated By Implicit GNP Deflator	25.96	29.30	29.96	29.94	30.99	38.27	38.56	41.41	42.98	45.94	Growth Rate: Standard Deviation:	6.51% .24
Dollars Deflated By Consumer Price Index	25.96	29.32	30.27	30.47	31.14	38.37	38.53	41.15	42.58	45.28	Growth Rate: Standard Deviation:	6.29% .22

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-39

SURPLUS/(DEFICIT) (OPERATING FUND ONLY) ($ Millions)
6 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	-1.03	-1.11	-2.39	-.89	-1.31	.35	-2.24	-1.83	-.41	.37
Dollars Deflated By Implicit GNP Deflator	-1.03	-1.06	-2.17	-.77	-1.05	.25	-1.52	-1.19	-.25	.21
Dollars Deflated By Consumer Price Index	-1.03	1.06	2.20	-.79	-1.06	.25	-1.52	-1.18	-.25	.20

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-40

EARNED INCOME ($ Millions)
19 Private Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
ctual ollars	44.69	54.50	49.04	55.79	58.77	60.61	66.18	77.55	85.75	103.62	Growth Rate: Standard Deviation:	8.58% .42
ollars Deflated By nplicit GNP Deflator	44.69	51.79	44.55	48.40	47.36	44.07	45.10	50.23	52.20	57.95	Growth Rate: Standard Deviation:	1.65% .38
ollars Deflated By onsumer Price Index	44.69	51.83	45.01	49.25	47.59	44.19	45.06	49.91	51.71	57.12	Growth Rate: Standard Deviation:	1.45% .37

ata deflated using indices readjusted to FY70 as the base.
ource of data: Individual organization financial statements.

TABLE 9-41

SUPPORT INCOME ($ Millions)
19 Private Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
ctual ollars	43.10	33.59	34.14	43.54	45.83	52.05	54.30	53.41	62.68	73.38	Growth Rate: Standard Deviation:	7.67% .57
ollars Deflated By nplicit GNP Deflator	43.10	31.92	31.01	37.78	36.94	37.85	37.00	34.61	38.16	41.04	Growth Rate: Standard Deviation:	0.80% .50
ollars Deflated By onsumer Price Index	43.10	31.94	31.33	38.45	37.12	37.96	36.97	34.38	37.81	40.45	Growth Rate: Standard Deviation:	0.60% .49

ata deflated using indices readjusted to FY70 as the base.
ource of data: Individual organization financial statements.

TABLE 9-42

TOTAL INCOME ($ Millions)
19 Private Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	87.80	88.08	83.18	99.33	104.60	112.66	120.48	130.96	148.43	176.99	Growth Rate: Standard Deviation:	8.12% .37
Dollars Deflated By Implicit GNP Deflator	87.80	83.71	75.57	86.18	84.30	81.92	82.10	84.82	90.36	98.99	Growth Rate: Standard Deviation:	1.23% .31
Dollars Deflated By Consumer Price Index	87.80	38.77	76.35	87.69	84.70	82.15	82.03	84.28	89.51	97.58	Growth Rate: Standard Deviation:	1.02% .29

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-43

TOTAL EXPENSES ($ Millions)
19 Private Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	68.52	78.07	75.26	86.06	94.00	110.47	122.24	133.62	134.39	157.19	Growth Rate: Standard Deviation:	9.76% .25
Dollars Deflated By Implicit GNP Deflator	68.52	74.20	68.37	74.67	75.76	80.33	83.30	86.54	81.81	87.91	Growth Rate: Standard Deviation:	2.76% .18
Dollars Deflated By Consumer Price Index	68.52	74.25	69.07	75.98	76.12	80.55	83.23	85.99	81.05	86.66	Growth Rate: Standard Deviation:	2.55% .18

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-44

SURPLUS/(DEFICIT) ($ Millions)
19 Private Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	19.28	10.01	7.93	13.60	10.60	2.19	-1.75	-2.66	14.04	19.80
Dollars Deflated By Implicit GNP Deflator	19.28	9.52	7.20	11.80	8.54	1.59	-1.19	-1.72	8.55	11.07
Dollars Deflated By Consumer Price Index	19.28	9.52	7.27	12.00	8.58	1.60	-1.19	-1.71	8.47	10.92

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-45

EARNINGS GAP ($ Millions)
19 Private Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	23.83	23.57	26.22	30.27	35.23	49.86	56.05	56.07	48.64	53.58	Growth Rate: Standard Deviation:	11.7 .7
Dollars Deflated By Implicit GNP Deflator	23.83	22.40	23.82	26.26	28.39	36.26	38.20	36.31	29.61	29.96	Growth Rate: Standard Deviation:	4.6 .7
Dollars Deflated By Consumer Price Index	23.83	22.42	24.06	26.73	28.53	36.36	38.16	36.08	29.33	29.54	Growth Rate: Standard Deviation:	4.4 .7

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-46

EARNED INCOME ($ Millions)
4 Public Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	2.20	2.76	2.89	2.30	2.98	2.77	3.76	3.53	8.71	5.63	Growth Rate: Standard Deviation:	12. 1.
Dollars Deflated By Implicit GNP Deflator	2.20	2.62	2.63	2.00	2.40	2.02	2.56	2.29	5.30	3.15	Growth Rate: Standard Deviation:	4. 1.
Dollars Deflated By Consumer Price Index	2.20	2.63	2.65	2.03	2.41	2.02	2.56	2.27	5.25	3.10	Growth Rate: Standard Deviation:	4. 1.

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-47

SUPPORT INCOME ($ Millions)
4 Public Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	4.82	5.34	5.27	7.79	10.05	10.10	10.19	12.34	14.37	14.61	Growth Rate: Standard Deviation:	14. .
Dollars Deflated By Implicit GNP Deflator	4.82	5.08	4.78	6.76	8.10	7.34	6.94	7.99	8.75	8.17	Growth Rate: Standard Deviation:	6. .
Dollars Deflated By Consumer Price Index	4.82	5.08	[illegible]	6.88	8.14	7.36	6.94	7.94	8.66	8.06	Growth Rate: Standard Deviation:	6. .

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-48

TOTAL INCOME ($ Millions)
4 Public Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	7.02	8.11	8.16	10.10	13.03	12.87	13.94	15.87	23.08	20.24	Growth Rate: Standard Deviation:	13. .
Dollars Deflated By Implicit GNP Deflator	7.02	7.70	7.41	8.76	10.50	9.36	9.50	10.28	14.05	11.32	Growth Rate: Standard Deviation:	6. .
Dollars Deflated By Consumer Price Index	7.02	7.71	7.49	8.91	10.55	9.39	9.49	10.21	13.92	11.16	Growth Rate: Standard Deviation:	6. .

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-49

TOTAL EXPENSES ($ Millions)
4 Public Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	6.74	7.79	7.28	9.12	11.64	12.38	14.69	16.90	20.83	18.67	Growth Rate: Standard Deviation:	14. .
Dollars Deflated By Implicit GNP Deflator	6.74	7.40	6.62	7.92	9.38	9.00	10.01	10.95	12.68	10.44	Growth Rate: Standard Deviation:	6. .
Dollars Deflated By Consumer Price Index	6.74	7.41	6.68	8.05	9.43	9.03	10.01	10.88	12.56	10.29	Growth Rate: Standard Deviation:	6. .

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-50

SURPLUS/(DEFICIT) ($ Millions)
4 Public Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	.28	.32	.87	.97	1.38	.49	–.75	– 1.03	2.25	1.58
Dollars Deflated By Implicit GNP Deflator	.28	.30	.79	.84	1.11	.36	– .51	– .67	1.37	.88
Dollars Deflated By Consumer Price Index	.28	.30	.80	.86	1.12	.36	–.51	– .66	1.35	.87

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-51

EARNINGS GAP ($ Millions)
4 Public Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	4.54	5.03	4.39	6.82	8.66	9.61	10.94	13.37	12.12	13.04	Growth Rate: Standard Deviation:	14. .
Dollars Deflated By Implicit GNP Deflator	4.54	4.78	3.99	5.92	6.98	6.98	7.45	8.66	7.38	7.29	Growth Rate: Standard Deviation:	7. .
Dollars Deflated By Consumer Price Index	4.54	4.78	4.03	6.02	7.02	7.00	7.45	8.60	7.31	7.19	Growth Rate: Standard Deviation:	7. .

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-52

TOTAL INCOME ($ Millions)
4 University Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.91	2.01	1.99	2.37	2.55	2.68	3.09	3.34	3.47	3.51	Growth Rate: Standard Deviation:	8.34 .2
Dollars Deflated By Implicit GNP Deflator	1.91	1.91	1.81	2.06	2.06	1.95	2.10	2.16	2.11	1.97	Growth Rate: Standard Deviation:	1.4 .24
Dollars Deflated By Consumer Price Index	1.91	1.91	1.82	2.10	2.07	1.95	2.10	2.15	2.09	1.94	Growth Rate: Standard Deviation:	1.2 .26

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-53

TOTAL EXPENSES ($ Millions)
4 University Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.94	1.92	1.98	2.36	2.37	2.72	3.14	3.34	3.41	3.48	Growth Rate: Standard Deviation:	8.4 .26
Dollars Deflated By Implicit GNP Deflator	1.94	1.83	1.80	2.05	1.91	1.98	2.14	2.16	2.08	1.95	Growth Rate: Standard Deviation:	1.54 .24
Dollars Deflated By Consumer Price Index	1.94	1.83	1.82	2.08	1.92	1.98	2.14	2.15	2.06	1.92	Growth Rate: Standard Deviation:	1.3 .26

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-54

SURPLUS/(DEFICIT) ($ Millions)
4 University Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
ctual ollars	-.03	.08	.01	.02	.19	-.04	-.05	.00	.06	.03
ollars Deflated By plicit GNP Deflator	-.03	.08	.01	.01	.15	-.03	-.04	.00	.04	.02
ollars Deflated By nsumer Price Index	-.03	.08	.01	.01	.15	-.03	-.04	.00	.04	.02

ta deflated using indices readjusted to FY70 as the base.
urce of data: Individual organization financial statements.

TABLE 9-55

MEMBERSHIP INCOME ($ Millions)
17 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	3.95	4.72	4.83	4.72	5.13	5.23	6.16	7.44	10.02	11.02	Growth Rate: Standard Deviation:	11.1 .6
Dollars Deflated By Implicit GNP Deflator	3.95	4.49	4.38	4.10	4.13	3.81	4.20	4.82	6.10	6.17	Growth Rate: Standard Deviation:	4.0 .6
Dollars Deflated By Consumer Price Index	3.95	4.49	4.43	4.17	4.15	3.82	4.19	4.79	6.04	6.08	Growth Rate: Standard Deviation:	3.8 .6

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-56

INVESTMENT INCOME ($ Millions)
17 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	23.05	28.14	19.65	20.99	24.37	21.36	23.19	24.34	25.96	31.94	Growth Rate: Standard Deviation:	2.2 .6
Dollars Deflated By Implicit GNP Deflator	23.05	26.74	17.85	18.21	19.64	15.53	15.80	15.77	15.80	17.86	Growth Rate: Standard Deviation:	-4.3 .6
Dollars Deflated By Consumer Price Index	23.05	26.76	18.03	18.53	19.74	15.57	15.79	15.67	15.66	17.61	Growth Rate: Standard Deviation:	-4.5 .5

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-57

AUXILIARY INCOME ($ Millions)
17 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	7.79	9.56	10.37	12.04	14.19	17.33	20.00	26.79	32.28	34.90	Growth Rate: Standard Deviation:	18. .
Dollars Deflated By Implicit GNP Deflator	7.79	9.08	9.42	10.45	11.44	12.60	13.63	17.35	19.65	19.52	Growth Rate: Standard Deviation:	11. .
Dollars Deflated By Consumer Price Index	7.79	9.09	9.52	10.63	11.49	12.63	13.61	17.24	19.47	19.24	Growth Rate: Standard Deviation:	11. .

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-58

EARNED INCOME ($ Millions)
17 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	42.28	51.83	46.19	51.97	55.03	57.20	64.24	74.97	87.49	101.44	Growth Rate: Standard Deviation:	9. .
Dollars Deflated By Implicit GNP Deflator	42.28	49.26	41.97	45.09	44.35	41.59	43.78	48.56	53.26	56.74	Growth Rate: Standard Deviation:	2. .
Dollars Deflated By Consumer Price Index	42.28	49.29	[illegible].40	45.88	44.56	41.71	43.74	48.25	52.76	55.93	Growth Rate: Standard Deviation:	2. .

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-59

SUPPORT INCOME ($ Millions)
17 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	36.77	35.25	35.48	46.97	49.36	56.28	58.65	58.95	68.76	77.85	Growth Rate: Standard Deviation:	9.40 .37
Dollars Deflated By Implicit GNP Deflator	36.77	33.50	32.23	40.75	39.78	40.92	39.96	38.18	41.85	43.54	Growth Rate: Standard Deviation:	2.39 .34
Dollars Deflated By Consumer Price Index	36.77	33.52	32.57	41.46	39.97	41.03	39.93	37.94	41.46	42.92	Growth Rate: Standard Deviation:	2.18 .3

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-60

TOTAL INCOME ($ Millions)
17 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	79.05	87.08	81.67	98.94	104.39	113.47	122.89	133.93	156.25	179.29	Growth Rate: Standard Deviation:	9.30 .30
Dollars Deflated By Implicit GNP Deflator	79.05	82.76	74.20	85.84	84.13	82.51	83.74	86.74	95.11	100.28	Growth Rate: Standard Deviation:	2.33 .26
Dollars Deflated By Consumer Price Index	79.05	82.81	74.97	87.35	84.54	82.74	83.67	86.19	94.23	98.84	Growth Rate: Standard Deviation:	2.12 .2

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-61

TOTAL EXPENSES ($ Millions)
17 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	65.24	76.38	72.28	84.83	90.80	109.43	125.02	137.76	139.92	159.39	Growth Rate: Standard Deviation:
Dollars Deflated By Implicit GNP Deflator	65.24	72.59	65.66	73.60	73.18	79.58	85.19	89.22	85.18	89.14	Growth Rate: Standard Deviation:
Dollars Deflated By Consumer Price Index	65.24	72.64	66.34	74.89	73.53	79.80	85.12	88.66	84.38	87.87	Growth Rate: Standard Deviation:

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-62

SURPLUS/(DEFICIT) ($ Millions)
17 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	13.82	10.70	9.40	14.44	13.59	4.04	-2.13	-3.83	16.32	19.91
Dollars Deflated By Implicit GNP Deflator	13.82	10.17	8.54	12.52	10.95	2.94	-1.45	-2.48	9.94	11.13
Dollars Deflated By Consumer Price Index	13.82	10.18	8.63	12.74	11.00	2.95	-1.45	-2.47	9.84	10.97

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-63

ATTENDANCE (Millions)
Comparison: 6, 4, and 9 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	FY80
6 Museums 1970-79	2.50	2.65	2.14	2.27	2.12	2.31	2.19	2.13	2.93	2.77	NA
4 Museums 1971-80	NA	2.62	2.11	2.29	2.07	2.15	1.98	1.95	2.72	3.80	3.43
9 Museums 1973-79	NA	NA	NA	5.32	5.46	6.47	5.79	6.14	6.94	9.56	NA

Source of data: Individual organization annual reports.

TABLE 9-64

MEMBERSHIP INCOME ($ Millions)
5 Museums with Art Schools

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	.90	1.05	1.04	1.18	1.35	1.44	1.51	1.88	2.21	2.47	Growth Rate: 11.57 Standard Deviation: .32
Dollars Deflated By Implicit GNP Deflator	.90	1.00	.95	1.03	1.09	1.05	1.03	1.22	1.34	1.38	Growth Rate: 4.46 Standard Deviation: .30
Dollars Deflated By Consumer Price Index	.90	1.00	.96	1.04	1.09	1.05	1.03	1.21	1.33	1.36	Growth Rate: 4.24 Standard Deviation: .29

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-65

EDUCATION INCOME ($ Millions)
5 Museums with Art Schools

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	2.47	2.80	3.13	3.48	3.99	4.52	5.05	5.42	6.19	7.24	Growth Rate: 12.36 Standard Deviation: .10
Dollars Deflated By Implicit GNP Deflator	2.47	2.66	2.84	3.02	3.21	3.29	3.44	3.51	3.77	4.05	Growth Rate: 5.20 Standard Deviation: .11
Dollars Deflated By Consumer Price Index	2.47	2.66	2.87	3.07	3.23	3.30	3.44	3.49	3.73	3.99	Growth Rate: 4.98 Standard Deviation: .1

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-66

INVESTMENT INCOME ($ Millions)
5 Museums with Art Schools

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	8.39	7.49	6.89	8.49	10.31	8.25	10.42	11.75	11.81	15.55	Growth Rate: Standard Deviation:	7.42% .66
Dollars Deflated By mplicit GNP Deflator	8.39	7.11	6.26	7.36	8.31	6.00	7.10	7.61	7.19	8.70	Growth Rate: Standard Deviation:	0.57% .61
Dollars Deflated By Consumer Price Index	8.39	7.12	6.33	7.49	8.35	6.01	7.09	7.56	7.12	8.57	Growth Rate: Standard Deviation:	0.36% .60

Data deflated using indices readjusted to FY70 as the base.
ource of data: Individual organization financial statements.

TABLE 9-67

AUXILIARY INCOME ($ Millions)
5 Museums with Art Schools

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	1.75	1.93	1.84	2.20	2.51	2.78	2.30	3.18	3.87	6.23	Growth Rate: Standard Deviation:	12.40% .95
Dollars Deflated By mplicit GNP Deflator	1.75	1.83	1.67	1.91	2.02	2.02	1.57	2.06	2.36	3.48	Growth Rate: Standard Deviation:	5.24% .87
Dollars Deflated By Consumer Price Index	1.75	1.83	1.69	1.94	2.03	2.02	1.57	2.05	2.34	3.44	Growth Rate: Standard Deviation:	5.02% .86

Data deflated using indices readjusted to FY70 as the base.
ource of data: Individual organization financial statements.

TABLE 9-68

EARNED INCOME ($ Millions)
5 Museums with Art Schools

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	15.46	15.98	15.43	18.93	21.60	21.00	24.04	26.47	29.20	37.28	Growth Rate: Standard Deviation:	9.87 .39
Dollars Deflated By Implicit GNP Deflator	15.46	15.19	14.01	16.42	17.41	15.27	16.38	17.14	17.78	20.85	Growth Rate: Standard Deviation:	2.87 .36
Dollars Deflated By Consumer Price Index	15.46	15.20	14.16	16.71	17.50	15.31	16.37	17.04	17.61	20.55	Growth Rate: Standard Deviation:	2.66 .35

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-69

SUPPORT INCOME ($ Millions)
5 Museums with Art Schools

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	15.91	15.25	10.52	10.67	18.87	19.64	18.80	15.00	22.73	24.54	Growth Rate: Standard Deviation:	6.38 1.16
Dollars Deflated By Implicit GNP Deflator	15.91	14.50	9.56	9.25	15.21	14.28	12.81	9.71	13.84	13.72	Growth Rate: Standard Deviation:	-0.40 1.04
Dollars Deflated By Consumer Price Index	15.91	14.51	9.66	9.42	15.28	14.32	12.80	9.65	13.71	13.53	Growth Rate: Standard Deviation:	-0.61 1.01

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-70

TOTAL INCOME ($ Millions)
5 Museums with Art Schools

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	31.37	31.23	25.95	29.59	40.48	40.63	42.85	41.47	51.93	61.82	Growth Rate: Standard Deviation:	8.28 .65
Dollars Deflated By Implicit GNP Deflator	31.37	29.68	23.57	25.67	32.62	29.55	29.20	26.86	31.61	34.57	Growth Rate: Standard Deviation:	1.38 .56
Dollars Deflated By Consumer Price Index	31.37	29.70	23.82	26.13	32.78	29.63	29.17	26.69	31.32	34.08	Growth Rate: Standard Deviation:	1.17 .54

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-71

EDUCATION EXPENSES ($ Millions)
5 Museums with Art Schools

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79		
Actual Dollars	3.14	3.49	3.63	4.18	4.60	4.95	5.67	6.28	7.08	8.47	Growth Rate: Standard Deviation:	11.27 .19
Dollars Deflated By Implicit GNP Deflator	3.14	3.32	3.30	3.63	3.71	3.60	3.86	4.07	4.31	4.74	Growth Rate: Standard Deviation:	4.17 .17
Dollars Deflated By Consumer Price Index	3.14	3.32	3.33	3.69	3.73	3.61	3.86	4.04	4.27	4.67	Growth Rate: Standard Deviation:	3.96 .17

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-72

TOTAL EXPENSES ($ Millions)
5 Museums with Art Schools

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	21.04	21.01	20.41	24.86	29.79	35.94	40.20	38.69	37.94	44.67	Growth Rate: 10.01 Standard Deviation: .53
Dollars Deflated By Implicit GNP Deflator	21.04	19.96	18.54	21.57	24.01	26.14	27.40	25.06	23.10	24.98	Growth Rate: 3.00 Standard Deviation: .46
Dollars Deflated By Consumer Price Index	21.04	19.98	18.73	21.95	24.10	26.21	27.37	24.90	22.88	24.62	Growth Rate: 2.79 Standard Deviation: .46

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-73

SURPLUS/(DEFICIT) ($ Millions)
5 Museums with Art Schools

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79
Actual Dollars	10.33	10.23	5.54	4.73	10.69	4.69	2.64	2.78	13.99	17.15
Dollars Deflated By Implicit GNP Deflator	10.33	9.72	5.03	4.11	8.62	3.41	1.80	1.80	8.52	9.59
Dollars Deflated By Consumer Price Index	10.33	9.72	5.08	4.18	8.66	3.42	1.80	1.79	8.44	9.46

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-74

ENDOWMENT FUND BALANCE - END OF THE YEAR ($ Millions)

12 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
Actual Dollars	313.32	351.03	371.44	360.26	315.99	318.10	324.38	326.34	321.28	328.93	Growth Rate: -0.67 Standard Deviation: -.28
Dollars Deflated By Implicit GNP Deflator	313.32	333.62	337.46	312.56	254.67	231.31	221.04	211.36	195.58	183.97	Growth Rate: -7.00 Standard Deviation: .31
Dollars Deflated By Consumer Price Index	313.32	333.84	340.93	318.05	255.88	231.95	220.86	210.03	193.75	181.34	Growth Rate: -7.19 Standard Deviation: .33

Data deflated using indices readjusted to FY70 as the base.
Source of data: Individual organization financial statements.

TABLE 9-75

ENDOWMENT FUND BALANCE - END OF THE YEAR ($ Millions)

Comparison of 3 Small, 4 Medium, and 5 Large Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	
3 Small Museums	.59	.60	.56	1.17	1.16	1.15	1.14	1.18	1.18	1.22	Growth Rate: 9.41 Standard Deviation: 1.09
4 Medium Museums	11.85	12.36	12.77	12.67	12.74	12.68	13.12	13.62	14.23	16.73	Growth Rate: 2.77 Standard Deviation: .26
5 Large Museums	300.87	338.03	358.11	346.42	302.09	304.27	310.45	311.87	306.21	311.33	Growth Rate: -0.76 Standard Deviation: .32

Source of data: Individual organization financial statements.

TABLE 9-76

FUND BALANCE AT THE END OF THE YEAR - ALL FUNDS ($ Millions)
Comparison: 12, 14, and 17 Museums

	FY70	FY71	FY72	FY73	FY74	FY75	FY76	FY77	FY78	FY79	FY80		
12 Museums 1970-79	383.53	418.66	448.74	457.14	431.28	448.39	458.50	454.03	462.57	491.60	NA	Growth Rate: Standard Deviation:	1.86 .19
14 Museums 1971-80	NA	397.79	430.25	442.96	417.13	434.87	445.76	452.75	467.84	511.13	566.56	Growth Rate: Standard Deviation:	3.03 .25
17 Museums 1973-79	NA	NA	NA	527.50	501.90	519.40	528.83	535.57	551.67	595.45	NA	Growth Rate: Standard Deviation:	2.11 .28

Source of data: Individual organization financial statements.

APPENDIX A

CRITERIA USED BY DIFFERENT ORGANIZATIONS FOR MEMBERSHIP OR INCLUSION IN A SURVEY

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National Research Center of the Arts, Inc. (NRCA) The Status of Nonprofit Arts and Museum Institutions in the United States in 1976 A-2

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CLASSIFICATIONS OF MUSEUMS

Classification of Types of Museums: Museum Program Survey, 1979 and Official Museum Directory, American Association of Museums and National Register Publishing Company A-9

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NATIONAL RESEARCH CENTER OF THE ARTS, INC. (NRCA)
The Status of Nonprofit Arts and Museum Institutions in the United States in 1976

Criteria for inclusion in the total listings (universe population) from which the sample was selected were the following:

1. Museums

   a. The institution has permanent facilities which are open to the public on a regularly scheduled basis.

   b. The facilities are open three months or more per year and a minimum of 25 hours per week during at least three months of the year.

   c. The museum owns or utilizes collections in the fields of art, history, science and technology, natural science, zoology, or botany.

   d. The museum is a nonprofit tax-exempt organization.

   e. The museum has at least one full-time paid employee with academic training or special knowledge relating to the major subjects represented in the collection.

   f. The operating budget for the most recent fiscal year averaged a minimum of $1,000 a month for each month the museum was open.

   g. If a museum is affiliated with another organization, it has to have functions and a budget that are identifiable and separate from the affiliate.

2. Performing Arts Organizations

   a. An organization has to be a nonprofit arts or cultural organization.

   b. An organization has to involve the efforts of more than one person in some type of associated or corporate form.

   c. An organization's operating expenditures in fiscal 1975-76 had to be a minimum of $5,000 or, if an organization were operative for fewer than 12 months, it had to have operating expenditures of at least $1,000 per month for three consecutive months.

   d. If an organization is affiliated with another organization, it has to have functions and a budget that are identifiable and separable from the affiliate.

   e. The organization must have one of the following: 1) the intention to pay performers, 2) paid audiences, or 3) one full-time professional employee.

3. Service Organizations and Other Arts

   a. An organization has to be a nonprofit arts or cultural organization.

   b. An organization has to involve the efforts of more than one person in some type of associated or corporate form.

   c. An organization must have functions, a budget, and financial records that are separable from an affiliated organization or individual person.

   d. The organization must have a person responsible for administrative direction and have been in existence for at least two years.

   e. The organization must not be exclusively a membership organization but offer programs or services in addition to membership.

OPERA AMERICA

Opera America's membership is composed of professional opera producing companies. There are two categories for membership. Correspondent Companies were not surveyed until 1977-78 year.

Criteria to qualify as a Member Company:

- be a nonprofit corporation in North, Central or South America.
- have scheduled and performed at least two performances each of three staged productions of operas during each of the two calendar years immediately preceeding the year of its application.
- employ at least one full-time professional manager on its staff.
- utilize an orchestra on a seasonal or annual, rather than a pickup basis.
- utilize a chorus on a seasonal or annual, rather than a pickup basis.
- utilize paid, professional artists for at least some part of its productions.
- be recommended for membership by two members of Opera America.
- have a budget not less than $150,000.

Criteria to qualify as a Correspondent Company:

- be a nonprofit corporation in North, Central, or South America.
- produce more than one performance of at least one opera per season before a paid audience for two consecutive years.
- utilize an orchestra for its productions.
- utilize paid professional artists for at least some part of its productions.
- have been in operation for two years with a minimum budget of $25,000.
- (If in operation less than two years) have performed at least two performances each of three operas for one year with a minimum budget of $150,000.

NATIONAL OPERA INSTITUTE

A Census of Organizations Producing Opera/Musical Theatre in the United States

The criteria used for inclusion were:

- organization has tax-exempt status under Section 501(c)(3) of the IRS code, or similar provision
- organization has included at least one fully staged production of an opera/musical theatre work in its repertoire during each of the last three seasons
- organization is the originating producer of its repertoire (not a booking or presenting organization)
- organization pays its artists wage scales which correspond to industry accepted minimums
- organization engages professional management

A basic criterion for inclusion in the Census was the regular, on-going production of opera/musical theatre, a criterion that was judged to have been met by the production of such works in each of the last three years. NOI found, however, a significant number of organizations which produced opera/musical theatre in two of the past three seasons and included them in a separate section. In addition, other organizations which responded too late or did not quite meet the criteria were listed but not included in any of the analysis.

OFFICE OF EDUCATION, U.S. Department of Health, Education and Welfare, Lola Eriksen, Museums and Related Institutions: A Basic Program Survey 1969.

The screening used to determine which operations would be included in the data-processed universe utilized the following criteria:

The museum—

1. Was open to the general public at stated hours, and at least 4 months per year or 8 hours per week.
2. Exhibited objects in at least one of the following categories, with the material generally being owned by the exhibiting organization or agency:
   a. Organized, labeled collections of objects, specimens such as historic artifacts, works of art, and science materials, including living plants and animals, but excluding library and archival materials, except for displays of exceptional historic interest, and exclusively research operations unless some educational/cultural activities (e.g., tours) were provided.
   b. Original or authentically reproduced period furnishings in original or authentically reproduced structures, but excluding those buildings still functioning expressly for original purpose (e.g., functioning court house).
   c. Dioramas, habitat groups, and/or teaching exhibits.
3. Had at least one of the following quality indicators:
   a. Cataloged collections
   b. Paid staff
   c. Professionally designed exhibits, or period furniture and furnishings, or authentic reproductions.
4. Was nonpforit unless the enterprise had a substantial scholarly base (professional staff and/or formal academic research.)

Museums USA

National Endowment for the Arts, 1974. Study conducted by the National Research Center for the Arts.

Six criteria developed by the museum experts were used to determine whether or not an institution qualified for the survey:

- The institution has permanent facilities open to the public on a regularly scheduled basis.
- The facilities are open three months or more per year and a minimum of 25 hours per week during at least three months of the year.
- The operating budget for FY 1971-72 (excluding expenditures for acquisitions of land, buildings, major equipment, and for collections) averages a minimum of $1,000 each month the museum is open.
- At least part of the collection exhibited is owned by the institution.
- The insitution has at least one full-time paid employee with academic training or special knowledge relating to the major subjects represented in the collection.
- The institution is a nonprofit tax-exempt organization.

NATIONAL CENTER FOR EDUCATIONAL STATISTICS AND INSTITUTE OF MUSEUM SERVICES, Museum Program Survey, 1979 and Universe Survey 1978.

The criteria used were defined in the following definition:

. . . an institution organized on a permanent basis for essentially educational or aesthetic purposes and that utilizes a staff; owns or uses tangible objects, whether animate or inanimate; cares for these objects; and exhibits them to the public on a regular basis.

CLASSIFICATION OF TYPES OF MUSEUMS USED IN NCES/IMS SURVEYS

A. ART

1. Art Associations, Councils and Commissions, Foundations and Institutes
2. Art Association Galleries
3. Art Museums and Galleries
4. Arts and Crafts Museums
5. China, Glass and Silver Museums
6. Civil Art and Cultural Centers
7. Decorative Arts Museums
8. Folk Art Museums
9. Textile Museums

B. CHILDREN'S AND JUNIOR MUSEUMS

C. GENERAL MUSEUMS

D. HISTORY

1. Historic Agencies, Councils, Commissions, Foundations, and Research Institutes
2. Historic Houses and Historic Buildings
3. Historic Sites
4. Historical and Preservation Societies
5. Historical Society Museums
6. History Museums
7. Maritime and Naval Museums and Historic Ships
8. Military Museums
9. Preservation Projects

E. PARK MUSEUMS AND VISITOR CENTERS

F. SCIENCE

1. Academies, Associations, Institutes and Foundations
2. Aeronautics and Space Museums
3. Agriculture
4. Anthropology, Ethnology and Indian Museums
5. Aquariums, Marine Museums and Oceanariums
6. Arboretums
7. Archaeology Museums and Archaeological Sites
8. Aviaries and Ornithology Museums
9. Botanical Conservatories, and Horticultural Societies
10. Entomology Museums and Insect Collections
11. Geology, Mineralogy and Paleontology Museums
12. Herbariums
13. Herpetology Museums
14. Industrial Museums
15. Medical, Dental, Health, Pharmacology, Apothecary and Psychiatry Museums
16. Natural History and Natural Science Museums
17. Nature Centers
18. Planetariums, Observatories, and Astronomy Museums
19. Science Museums (General Science, Physical Science, Science-Technology Center)
20. Wildlife Refuges and Bird Sanctuaries
21. Zoology Museums, Zoos, Children's Zoos

G. SPECIALIZED

1. Antiques Museums
2. Architecture Museums
3. Audio-Visual and Film Museums
4. Circus Museums
5. Communications Museums
6. Costume Museums
7. Crime Museums
8. Forestry Museums
9. Furniture Museums
10. Gun museums
11. Hobby Museums
12. Horological Museums
13. Money and numismatics Museums
14. Musical Instruments Museums
15. Outdoor Museums
16. Philatelic Museums
17. Religious Museums
18. Theater Museums
19. Toy and Doll Museums
20. Transportation Museums
21. Wax Museums

Source: Official Museum Directory*
American Association of Museums and National Register Publishing Company

*Other categories in the Directory were College and University museusm; Company Museums; Exhibit Areas; Libraries Having Collections Other than Books; National and State Agencies, Councils, and Commissions; and Nature Centers.

CLASSIFICATION OF TYPE OF COLLECTION (MUSEUM)

1. ART

Arts and Crafts
Decorative Arts
Fine Arts
Folk Art
Photography
Technological Art/Design
Other Art (specify)

2. HISTORY

Historic Houses and Historic Buildings
Historic Sites
History
Maritime Naval and Historic Ships
Military
Other History (specify)

3. SCIENCE

Aeronautics, Astronomy, and Space
Animal (live) Aquatic, Entomogical, Herpetological, and Ornithological
Animal Preserved
Anthropological, Ethnological, and Indian
Archaeological
Geological, Mineral, and Paleontological
Industrial
Medical, Dental, Health, and Pharmacological
Natural History and Natural Science
Plants, Agriculture, Arboreous, Botanical, Herbaceous, and Horticultural

3. SCIENCE (Continued)

Science General
Physical Science and Math
Technology
Other (specify)

4. SPECIALIZED

Antiques
Architectual
Audio-Visual and Film
Circus
Communications
Costume
Crime
Forestry
Furniture
Gun
Hobby
Horological
Money and Numismatic
Musical Instruments
Philatelical
Religious
Theatrical
Toy and Doll
Transportation
Other (specify)

Source: Museum Program Survey 1979

APPENDIX B

IMPUTATION AND CORRECTION OF DATA

IMPUTATION

To calculate accurate growth rates on variables of data, no missing obvservations should occur. If there are missing observations, then the growth rate is based on inaccurate data and is itself unreliable. Therefore, where an organization did not have a value for a particular variable, our choice was to either impute a value to plug the hole or eliminate that organization from the calculation of the growth rate. For a few missing data items, we did impute missing data, but for most missing data values we chose to eliminate the organization rather than plug with average or formula-created values. When we did impute data, we imputed values organization by organization.* We usually used the average between the two years on either side of the missing data item, unless we had a particular piece of informaton that made a different value for the missing data more appropriate.

The following data were imputed (also see the separate chapters for details):

Symphony	Major variables of earned, support, and total income, expenses, and earnings gap ere imputed for Major orchestras that did not report. Other variables were not imputed. For the samples of all Regional and all Metropolitan orchestras, imputation was done by using averages of those that did report for those that did not report. Again, this was only for the important variables. No growth rates were calculated for other variables.
Operas	No imputations were made because data for operas are so volatile from one year to the next due to the nature of opera production.

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* The only exception was for two groups of orchestras for the variable "total expenses" only.

Theaters	Data values were imputed only for missing conservatory (theater school) figures. See the chapter on Theaters for more detail.
Dance Companies	Total Expenses were imputed for two missing years for one organization. This was done after discussion with the general manager of the company regarding the level of activity for that year. Also, see the chapter on Dance for specifics on data corrections.
Museums	Data for private and government support were imputed for one organization for four years. Total support was reported for each year and the split between the private sector and government was made according to the ratio of later years.

DATA CORRECTION

Because each of our data bases (except orchestra) was developed from two different data bases or from financial statements (which usually lacked consistency throughout the decade), we found a number of problems, some of which we corrected. Discussion of these problems and our resolution is given below.

Definition of Data Items. Lack of adequate item definition or specific inclusion or exclusion of items significantly altered some data items. Where particular items have been defined, even if that definition differs from one data source to another, the differences in definition can be accounted for and the data adjusted to make them equivalent from one year to the next.

For example, a major problem was in the placement of grants (especially government grants). In the Ford Foundation study, there were two places where a respondent could include a grant from government, either under "grants for services required" which was part of performance income under earned income, or under support income from government sources. Since Earned Income is one of two major components of the Earnings Gap, this misplacement of as significant an item as "grants with services" could materially distort the data. Opera America (until 1980) and TCG (in its early years) had no instructions; they just listed various data items. Since we had individual organization data for 1974 from both the Ford Foundation and the alternate source for operas and theaters, we made indepth comparisons so that we could account for reporting differences. Out of 18 operas that we tried to match up (using 1974 data from both data sources), nine reported government grants in different places. One included a government grant in the Ford Foundation and excluded it in Opera America, one included the grant in Opera America and excluded it from the Ford Foundation. The other seven put their grants in a different place on the two questionnaires. This same problem occurred in the 18 theaters we tried to match. The TCG questionnaire in 1974 lacked definitions about the placement of government monies and, consequently, six were inconsistent from one questionnaire to the other. For dance comapnies, we found that most financial statements put all government grants together, thus differing from the Ford Foundation data base. For museums, the practice was relatively consistent on financial statements—to record all government monies in one place. The major problem with museums was that some financial statements did not segregate government from private support at all.

Another problem area was "corpus earnings" or Endowment Income. In the Ford Foundation, this was defined as "...income earned from endowment corpus funds, capital funds, or special funds that was used for operating income...". It was placed after public and private support (contributions and grants) but before the total for unearned (i.e., support) income. This varied from the accounting convention during the 70's (this convention is still followed) in which, if it was included at all in the "operating income", it was usually considered earned income.

In no other questionnaire were corpus earnings segregated from other investment earnings, thus destroying any comparability in earned and support income totals between questionnaires. To gain comparability, we placed the Ford Foundation's corpus earnings under earned income to match other data bases.

The source of contributions was another problematic area. In opera and theater, contributions from individuals, foundations, and businesses were hopelessly mixed up. The total of the three items, including united arts fund contributions, matched in a majority of the cases. Lack of proper specification is probably the root of the problem. Without defining small family foundations and trusts as either "individual contributions" or "foundation contributions", the respondent is forced to make that choice and can arbitrarily chose one or the other. Furthermore, that choice may vary from year to year or from questionnaire to questionnaire. It is the variance in what is included that destroys the meaning of the data. United arts fund giving presents a similar morass. Two theaters listed a UAF gift in TCG as a business gift in the Ford Foundation because a business had given a contribution that was funneled thorugh a UAF and the Ford Foundation did not have a separate UAF line. Out of ten theaters that reported the same figures for private conributions, only two reported the underlying data items in the same way on both questionnaires.

For dance and museums, where we worked from audited financial statements, we usually lacked any detail on the source of private contributions. Major grants from foundations or businesses would infrequently appear, but more often they would be lumped in with individual giving. Where we also have data from IRS Form 990s, we found that the private giving is also lumped together. However, all grants from governmental sources were usually segregated by the auditors. The normal accounting convention has been to report all government funds as support income, even for "grants with services required". The main problem that we encountered with financial statements was that sometimes there would be no breakout between private and public (government) support. A single figure would be reported for all grants and contributions.

As a footnote, the conclusion that we draw from this experience is that data items must be well defined, and what is to be included or excluded must be stated. Organizations that have been collecting financial informaton have obviously also come to this conclusion. TCG and Opera America over the years since 1974 (their first year) have made their questionnaires more detailed and have more carefully defined data items. The IRS also has changed its form mainly to include more detailed definitions.

Definition of the Organization. As we compared data of individual organizations, especially theaters and dance companies, we found another definitional problem: which part of the organization in question were we measuring? Of the 18 theaters we compared, we found nine that had major differences that we should investigate. Of those nine, three theaters' differences could be accounted for because they had reported their conservatory/school financial figures in the Ford Foundation and had excluded these in the early years of the TCG survey. It was not clear on either the Ford Foundation form or TCG's form that one was either supposed to include or exclude affiliated activities, such as the school. The Ford Foundation did have the instruction that the financial figures reported should match the audited figures and, in most cases, a school of the performing arts organization is included in the audited figures. By 1977, TCG had restructured the questionnaire and was asking for audited financial statements to verify reported figutes and, in later years, those three theaters included their school activities.

If one looks at expense totals for these three organizations, steady growth is seen throughout the Ford Foundation, a leveling off or decrease for TCG in the years 1974 through 1976, and then further growth. If one looks at the "organization" without its school figures for the Ford Foundation years and later TCG years, or preferably by adding the school into the middle years, one obtains a more realistic picture reflecting more even growth over the decade. Therefore, for the three theaters with missing figures, we imputed the school income and expense figures and added these to the other operations.

In dance, the problem was even more obvious. Because we had financial statements, we could clearly see whether the dance or ballet company had reported their school in the Ford Foundation. Our rule of thumb became "as reported in the Ford Foundation, so we will do in the 70's Decade Study". This school problem arose in seven out of 15 modern dance and ballet companies. Only one, Martha Graham, presented difficulty in resolving. We had only the company's figures and not the school's figures for 1975. However, because of the reporting of beginning and ending fund balances for 1974 and 1976, we could interpolate how the school had done (its deficit) and then estimate (impute) its tuition receipts and expenses, based on prior and following years.

Schools did not present a problem in the museum data base. All museums which considered schools an integral organizational part reported them in their financial statements.

The inclusion/exclusion of the school problem is symptomatic of a larger problem: what part(s) of the organizaton should one look at? Nonprofit organizations (and especially larger arts and cultural organizations) usually do not account for and report their finances in a single fund. Their financial activity is split into funds according to donor restriction or to how the organization uses them. This problem exists to a greater extent in museums, but also appears in the larger performing arts. Most data collections in the past have requested information from the "operating fund" or from "all funds used for current operations". The latter would include restricted funds for current use, whereas the former definition would most likely exclude these funds.

However, many organizations have "endowment funds" and/or a "plant" or "building fund," and in the case of museums, possibly an "acquisitions fund." If one sees only the "operaring fund," one might miss grants from NEA and others for purchase of arts objects, for creation of a special ballet program, and for construction and renovation of facilities. Although it is more common to see all expenses contained in the "operating fund," sometimes maintenance and utility costs are in another fund. However, the most significant missing data would be contributions and grants to the nonoperating funds. These frequently represent a significant part of the organization's total income. Their absence, if only the operating fund is seen, will understate the organization's ability to raise contributed income.

In creating a museum data base, we have data on six museums that reported both operating and total funds information. Five of the six reported a significant deficit in the "operating fund" for most or all of the ten years. However, when the other funds are included and the picture is of the entire organization, the income side dramatically changes, and a surplus is usually reported. It is true that the board's discretionary use of that other income may be very limited, and that the picture is not as rosy as may appear using all funds. However, it is also not the dismal picture reflected by the "operating fund" deficit either. From reading the director's or the president of the board's annual report (which we have for about half of our organizations), it becomes clear that, in many cases, the board had chosen to increase the endowment fund or raise money for a major construction project, rather than raise funds to cover the "operating" deficit.

Our conclusion from this is that to measure the economic activity of larger arts organizations, one should look at the total organization, i.e., all funds combined, and also look at the "endowment," "plant," and "funds used for current operations" separately. We did this where possible for only the museum data base. As a footnote, we suspect that the museum surveys performed in the past have significantly undercounted the economic size of the museum industry because they have only asked for operating income (or did not specify this, in which case they will have gotten only the operating income). The other disciplines were based on either the Ford Foundation or ASOL early 70's data. Since it was most important to have consistent data, we followed whatever format existed. Furthermore, this problem is not as acute in the performing arts for the 70's as with museums. However, as the chapter on Orchestras discusses, some very large sums of money were given for non-operating purposes, which may explain the ability of organizations to run with deficits in the operating fund for a number of years.

One other reconciliation problem we encountered in the theater area was with university affiliated theaters. The problem of measuring in-kind contributions from parent organizations has been recognized for the last several years by TCG. It is not an easy problem to solve, but is one that cannot be ignored in data collection and analysis. In our theater sample, we had three university affiliated theaters, all of whose data differed significantly in 1974 between the Ford Foundation and TCG. Neither questionnaire had specifically addressed the problem, which left the three respondents to grapple with the problem on their own. Each resolved it in a different way. However, by 1979, TCG had a questionnaire that took the in-kind services into account and consequently, the three began reporting this non-cash economic activity in a similar manner.

This same problem is a significant one in the museum field. Such services are not valued in the organization's books. In collecting financial statements from university and state/municipal museums, we spoke with several directors or business officers over the phone. They all had some estimate of the value of the services they currently receive. However, recreating that data for years past was determined to be too difficult and financial statements in the 1970's consistently ignored this type of economic activity.

Resolution of the Problems. For the three performing arts disciplines in which we matched data to the Ford Foundation's data base, the reconciliation was as follows:

Opera: 21 organizations

4 matched for major data elements.

9 were fully reconciled.

2 had arithmetic errors that we found and corrected.

2 had totals correct, but underlying data could not be reconciled.

2 had minor differences (under 2%)* that could not be reconciled.

2 had major differences (about 10%) that could not be reconciled.

Theater: 18 organizations (none matched exactly)

5 were fully reconciled.

4 had minor differences (under 2.5%) that could not be reconciled.

7 had differences (up to 60%) that we identified and adjusted. (These differences were due to inclusion/exclusion of the conservatory/school, in-kinds from the university, or an accounting mistake such as recognition of a grant.)

2 had major differences (10%) that could not be reconciled.

Dance: 15 organizations

14 organizations were matched for major data elements.

1 company had to have data adjusted for one year to account for reporting differences.

Therefore, definitional differences, as well as differences in survey design, were taken into account in the process of creating our data bases. Since both symphony and museum data come from a single source (ASOL and annual reports/financial statements, respectively), this resolution problem did not arise.

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* Throughout this section on the resolution, the percentages refer to total budget size of the organization.

APPENDIX C

CALCULATING THE GROWTH RATE

We are given a set of data $X_1,\ldots\ldots,X_n$ where n is the number of years in our sample and X_t is the observation in year t for a given variable and a given group of organizations. To estimate the growth rate γ for that variable and group of organizations, we first transform $X_1,\ldots\ldots,X_n$ to $z_1,\ldots,z_n$ where $z_t = \log X_t$. Then, since we assume exponential growth, i.e., $z_t = \alpha + \beta t + \epsilon_t$, where ϵ_t is an error term,* we use least-squares theory to obtain an estimate of β , $\hat{\beta}$, as well as an estimate of the variance of $\hat{\beta}$. From these we obtain an estimate of the growth rate γ, $\hat{\gamma}$, and of the standard deviation of $\hat{\gamma}$.

The exact procedure for these calculations, as well as an example, follows.

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*The error term is assumed to be normally distributed with mean 0 and variance σ^2.

Formulas for Calculating Growth Rate and Its Standard Deviation

1. $SS_{tz} = \sum tz - \dfrac{(\sum t)(\sum z)}{n}$

2. $SS_t = \sum t^2 - \dfrac{(\sum t)^2}{n}$

3. $SS_z = \sum z^2 - \dfrac{(\sum z)^2}{n}$

4. $\hat{\beta} = \dfrac{SS_{tz}}{SS_t}$

5. $\hat{\gamma} = 100 \left[\text{ANTILOG}(\hat{\beta}) - 1 \right]$

6. $\hat{\sigma}^2_{\hat{\beta}} = \dfrac{SS_z - \hat{\beta}(SS_{tz})}{(n-2)(SS_t)}$

7. $\hat{\sigma}_{\hat{\beta}} = \sqrt{\hat{\sigma}^2_{\hat{\beta}}}$

8. $\hat{\sigma}_{\hat{\gamma}} = 100 \left[\text{ANTILOG}(\hat{\beta}) \right] \left(\hat{\sigma}_{\hat{\beta}} \right)$

Example

t	t^2	X	$z = \log X$	z^2	tz
1	1	5.237	.7191	.5171	.7191
2	4	5.425	.7344	.5393	1.4688
3	9	5.490	.7396	.5470	2.2188
4	16	5.447	.7362	.5420	2.9448
5	25	5.635	.7509	.5639	3.7545
6	36	6.194	.7920	.6272	4.7520
7	49	6.733	.8282	.6859	6.7974
8	64	7.210	.8579	.7361	6.8632
9	81	7.185	.8564	.7335	7.7076
10	100	8.071	.9069	.8225	9.0690
$\Sigma t = 55$	$\Sigma t^2 = 385$		$\Sigma z = 7.9216$	$\Sigma z^2 = 6.3145$	$\Sigma tz = 45.2952$

1. $SS_{tz} = 45.2952 - \frac{(55)(7.9216)}{10} = 1.7264$

2. $SS_t = 385 - \frac{(55)^2}{10} = 82.5$

3. $SS_z = 6.3145 - \frac{(7.9216)^2}{10} = .03932534$

4. $\hat{\beta} = \frac{1.7264}{82.5} = .02092606$

5. $\hat{\gamma} = 100 \left[\text{ANTILOG}(.02092606) - 1\right] = 4.936\%$

6. $\hat{\sigma}_{\hat{\beta}}^2 = \frac{.03932534 - (.02092606)(1.7264)}{(8)(82.5)} = .00000485$

7. $\hat{\sigma}_{\hat{\beta}} = \sqrt{.00000485} = .00220144$

8. $\sigma_{\hat{\gamma}} = 100 \left[\text{ANTILOG}(.02092606)\right] (.00220144) = .231$

APPENDIX D

THE ECONOMIC BEHAVIOR OF ARTS ORGANIZATIONS

INTRODUCTION

In this Appendix, we attempt to define the relationship between general economic conditions and the condition of the arts by setting up an economic model. We are, therefore, dealing with conditions in the "industry," rather than of an individual "firm" in the industry. As in all economic theory, aggregate behavior is derived from the behavior of its components. First is developed a theory of the behavior of an art "firm," and from that is derived the behavior of the "industry."

A THEORY OF THE ECONOMIC BEHAVIOR OF ARTS ORGANIZATIONS

The arts organizations are benevolent monopolists. Although they control price, they are in the not-for-profit sector. As such, their goal is not profit maximization but the dissemination of their services to the widest audiences, subject to (1) their individual budget constraints and (2) their maintenance of or increase in the present quality of their productions or services. For example, a symphony orchestra is not likely to switch to popular music, even though that could increase its audience immensely. Furthermore, to maintain not-for-profit status (i.e., income tax exempt) from the Internal Revenue Service, an organization must (1) continue to provide goods and/or services that are within the scope of activities for which the IRS granted tax-exempt status and (2) not show an exorbitant profit from its activities over time.

Since the goal of arts organizations is to maximize audience size, they are very hesitant to raise ticket prices even to cover costs. In our symphyony orchestra example, if expenditures had to be covered solely by ticket receipts, artistic performances would be priced out of the reach of most consumers, and attendance would be limited to a select group. Consequently, receipts (also called earned income) seldom cover expenditures, producing for most arts organizations a gap referred to as the earnings gap. To cover the earnings gap, arts organizations have another source of income--contributions (also called support income). Together, the earned income and the support income represent the total income available to offset the expenses of an organizations. Each arts organization must balance its revenue and contributions against expenses, not on a year-by-year basis, but on a long-run basis. It cannot allow its deficit to accumulate indefinitely.[1] Its constraint is

$$\sum_{\text{n years}} (E_i - R_i - C_i) = 0$$

where:

E_i = total expenditures for the i^{th} firm

R_i = total revenues for the i^{th} firm

C_i = total contributions to the i^{th} firm

The unique position of such a firm allows it many ways by which to attain its balance. It can increase prices, seek more contributions, cut back output, hold the lid on wage increases, etc. We will next examine how its expenditures, revenue, and contributions are determined.

Expenditures

Total expenditures consist of two components: artistic labor costs and the costs of other inputs (which include non-artistic labor). Total expenditures are determined solely by total expected income (revenues and contributions) because of the firm's budget constraint. Hence, if total income goes down, total expenditures must go down. Or if the costs of its input go up, it must either raise its income or cut back on its output. We will, therefore, look first at the determinants of the firm's output.

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[1] It should be noted that this long-run balancing may span several decades, especially if the organization has a large endowment. For example, in the late sixties and early seventies, the major orchestras were closing their deficits by dipping into their accumulated endowments.

Total output depends on the costs of the factors of production--the wage rate of artistic labor and the prices of other inputs. We can lump these latter prices into one average price, and since we don't know the specific prices of all the other inputs, we assume that they move with the general price level. In addition, the level of output depends on the total income of the firm; i.e., with the same wage rate and prices, a firm with an annual income of $1 million will produce more than a firm with a half-million annual income.

We measure output by its value, i.e., real expenditures, which means that we must deflate total expenditures by an index of costs. In the arts, however, artistic wage rates do not move directly with the prices of other inputs, for which we use the general price level as a proxy. We use, instead, a weighted combination of the wage rate and the price level--the weights being the fractions of total expenditures going to wages and other inputs. A change in real expenditures may include a change in quantity--e.g., length of season--or in quality of inputs. In this formulation we need not be concerned about measuring quantity or quality, an unresolved difficulty in the services generally and in the arts particularly. We, therefore, have a "supply" function of the arts firm, with output measured by its value.2/

$$e_i = e_i(W_a, P, TI_i) + U_{ei} \tag{1}$$

where:

e_i = real expenditures of the i^{th} firm

W_a = artistic wage rate

P = general price level

TI_i = total income of the i^{th} firm

U_{ei} = random error term

2/ This supply function also takes into account capital-labor substitution in response to changes in their relative prices. In the arts, however, the evidence shows that such substitution is minimal or nonexistent (Ford Foundation. The Finances of the Performing Arts, Vol. 1, 1974. p. 59)

The wage rate in the arts refers not only to the hourly or weekly wage rate, but also to the number of weeks for which a player must be paid. We will see later that, as a result, labor determines the level of output to a large extent.

Our next problem is, How do we measure total income? Is it this year's income, last year's, or something else? The expenditures for this year are decided by last year's contracts. Hence last year's income would appear to be relevant. On the other hand, we cannot totally ignore this year's income, for if the organization anticipates a certain amount of contributed income next year, it will contract now for more expenditures. A more correct measure, in our opinion, would be a measure of the "permanent" income of the firm. Suppose a one-year grant was donated; does that imply that the firm will double expenditures this year and cut back next year to its old level? The likelihood is that it will increase this year's expenditures only somewhat and shift some resources to future years. (Because of grant requirements, the organization must typically use the entire grant in the year it is given, but it is not deterred from diverting other resources.) The firm reacts to its usual or permanent level of income and spends in relation to that, whether the current year's income is above or below that level. In this way, a firm could plan for a deficit this year, if it expects it to be temporary. In practice, a measure of the permanent income is a weighted average of several years' income.[3/]

Revenue

Revenue to the firm is an expenditure to the consumer. Hence, it is a usual "demand" function, in terms of total expenditures rather than quantity purchased. Since we are looking at demand over time, with a changing population, we look at revenue per capita of population, which depends in turn on prices and income. (We assume that prices of substitutes vary with the general price level.)

[3/] For a full discussion of permanent income and how to estimate it empirically, see Friedman, Milton. A Theory of the Consumption Function. Princeton University Press, 1957.

In addition, we must include the cost of time, the other part of the "true price" of attending a performance or exhibition (the consumption of some "art" does not requrie time, but this is a minority of arts consumption). It has been shown [4] that, in general, if we do not take time costs into account, we will bias the income coefficient. This holds even more so in the arts, an extremely time-intensive good. To measure time costs, it is standard to use the general wage level. We have, then:

$$r_i = r_i(P_a, P, DPI, W) + U_{ri}$$ [5]

where:

r_i = total receipts per capita of the i^{th} firm (2)

P_a = price of output

DPI = disposable personal income

W = general wage level

Contributions

Contributions to the arts consists of three components: (1) contributions from individuals and businesses, (2) government grants, and (3) income from an organization's endowment. We include income from endowments in contributions, for conceptually they are simply a long-term stream of contributions. That is, when an endowment fund is set up, the organization is bestowed with a permanent stream of contributions, irrespective of whether it is given title to the endowment principal. If, in addition, it is granted unrestricted rights to the principal, it has the additional option of using the principal itself.

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[4] Mincer, Jacob. "Market Prices, Opportunity Costs and Income Effects." In: Measurement in Economics: Studies in Mathematical Economics and Econometrics in Memory of Yehuda Greenfield. Stanford University Press, 1963.

[5] To use this demand equation in cross section, we must add a quality variable for the different organizations. The same holds for the contribution equation. For our purposes, it is assumed that in the aggregate over time, quality has not appreciably changed. Also, this equation holds only for a constant supply of output.

(1) Contributions from individuals and businesses depend on the general level of philanthropy and, possibly, on financial conditions in the arts. We have, then, for one firm:

$$c_i = c_i(GC, FC_i) + U_{ci} \tag{3}$$

where:

c_i = total contribution per capita to the i^{th} firm

GC = general level of contributions

FC_i = financial condition of the i^{th} firm

It should be pointed out that this equation is for a constant level of solicitation of funds by management. If, however, for example, management decides to conduct a new fund-raising dinner, then contributions can increase even with the same general level of contributions and financial condition of the organization. We are not interested, though, in equation (3), but in the industry function, and here we must beware of the "fallacy of composition."

The empirical evidence so far on the effect of FC_i on c_i is inconclusive.[6] But even if a worsening of the financial condition in one firm led to an increase in contributions to that firm, it does not necessarily follow that a worsening in the entire industry's financial condition will lead to an increase in contributions to the industry. For even if it were true that contributors shift their contributions from firm A to firm B in response to a worsening of B's position relative to A, it is not necessarily implied that they will shift contributions from hospitals to the arts—or, even from operas to museums—and even less so that the general level of contributions will be increased in response to a worsening of the industry's situation.

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[6] The study by Elsie Myers Martin ("A Study of Financial Support to the Performing Arts." Masters expository paper, University of North Carolina, Chapel Hill, July 1965) shows only that in the cross-section contributions respond to the accumulated deficit. But this does not really prove anything, for a large accumulated deficit could imply that the organization is large and has large annual contributions. To test Martin's hypothesis, the individual firms would have to be analyzed over time or be standardized for size in the cross-section.

We therefore have an industry contribution function:

$$c = c(GC, FC) + Uc \qquad (3a)$$

where:

c = total per capita contribution to the industry.

This will enable us to see whether industry contributions vary with industry financial conditions.

(2) A component of contributions consists of grants from all levels of government. Authorizations are a function of economic as well as political variables. In our model, government contributions are treated as a pre-determined variable.

(3) Income from an organization's endowment is determined by past contributions. An analysis of this income would require a theory of long-term contributions. However, all that affects the organization's output and pricing decisions is the current income from endowments, which it treats as a guaranteed income, as we have seen in the discussion of output decisions, and because this income is determined by past contributions to the endowment fund, we need not inquire into its determinants.

Ticket Admission Prices and Artistic Wages

So far we have discussed our basic system. We still have, however, possibly two endogenous—determined within the system—variables: ticket/admission price and wage rate.

Baumol and Bowen [7] hypothesized that firms raise prices when costs, i.e., the wage rate and/or the price of other inputs, go up. However, observers of the behavior of arts organizations indicate that such firms are reluctant to raise prices for fear of driving away customers, and use it only as a last resort when the financial situation is desperate. We believe that they are less reluctant to raise prices if the prices of all goods (i.e., the general price level) are rising. If so,

$$Pa_i = p_i \ (W_a, P, FCi) + U_{pi} \qquad (4)$$

Wages in the arts depend on general economic conditions—wage and price levels—though with lags and variations in pattern due in great part to productivity gains in the general economy, with virtually none in the arts sector. In addition, Baumol and Bowen hypothesized that the firms tend to increase salaries consequent upon an increase in revenues, largely because of the pressure of labor during periods of high income. We have, then:

$$Wa_i = w_i \ (W, P, FCi) + Uw \qquad (5)$$

Wages in the arts have two dimensions: (1) wage rate per time period, i.e., per day, week, etc., and (2) the required number of pay periods each year. These two tend to move together. The importance of the latter dimension is that it directly determines the amount of output, for when labor and management agree to increase the number of paid weeks, the performing season or number of exhibitions is automatically lengthened, unless management wants to pay for no work.

As a result, it often appears that labor directs the movement in the arts. In this respect, it is similar to Pauly and Redich's treatment of the hospital as a cooperative operated to maximize the income of the primary labor input (physicians).[8] In the arts as well, labor's goal is to maximize its income, subject to the budgetary constraint, and often, especially with a powerful union, it comes very close to meeting that goal. Although there are no unions in the non-performing arts, the goal of labor in that sector remains the same. However, we do not treat the arts in precisely this manner, since management has a distinct role with other (and possibly) conflicting goals.

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[7] Baumol, William J., and Bowen, William G. Performing Arts — The Economic Dilemma. The Twentieth Century Fund, 1966.

[8] Pauly, Mark, and Redisch, Michael. "The Not-for-Profit Hospital as a Physicians Cooperative." American Economic Review 63(1):87-89, March 1973.

THE SYSTEM IN OPERATION

Let us now put together the entire system for the industry (the aggregate of arts organizations) and see how it operates. We have postulated that it is the goal of management to mazimize attendance (output) subject to two factors:

(a) maintaining its level of quality

(b) $\sum E - R - C = 0$

where expenditures, revenues, and contributions are determined in the following simultaneous fashion:

$$e = e(Wa, P, TI) + Ue \tag{1}$$

$$r = r(Pa, P, DPI, W) + Ur \tag{2}$$

$$C = c(GC, FC) + Uc \tag{3}$$

$$Pa = p(Wa, P, FC) + Up \tag{4}$$

$$Wa = w(W, P, FC) + Uw \tag{5}$$

where all the variables are for the industry.

Expenditures in the budget constraint are related to output in (1) by:

$$E = e \times Co \tag{6}$$

where

$$Co = \sum_{i=1}^{k} p_i P_i \tag{7}$$

and p_i and P_i are the proportion and price of the i^{th} factor input, respectively.

In addition, as was noted above, a major determinant of the shape of the wage function is labor. In the limited case of an all-powerful union, every increase in income is diverted to an increase in Wa, and thus it would appear that the industry behaves as if its goal were to maximize Wa subject to its constraints.

It is clear that the budget constraint maintains overall control of the system. Since an organization cannot maintain indefinitely either a profit or a loss, an increase in income must be matched by a corresponding increase in expenditures, as well as the reverse. For the same reason, the earnings gap is determined at the same time as are contributions, for over the long run they are identical, and both are determined simultaneously with every other variable in the system. Hence, a change in any component of the system is not an isolated event, but affects other components of the system. To more fully comprehend the operation of the system let us take a look at two possible scenarios.

Scenario I

(1) Assume labor strikes force a higher wage rate (per week) for the same services performed.

(2) This may be followed by (a) decrease in output, thus saving costs of other inputs, and/or (b) increase in ticket prices, Pa, and/or (c) management seeking increased contributions.

(3) As a result, (a) revenue may increase from an increased price of ticket, and/or (b) contributions may respond to increased need.

If, for example, management attempts (2c), and (3b) doesn't happen, it then tries (2b). If that also doesn't work, it must resort to (2a) and, if necessary, even lay off players. At this point, an agreement may be reached not to raise wages, thus causing a decrease in real wages.

Scenario II

(1) Assume that a benefactor donates a huge contribution.

(2) This may result in (a) increased output, and/or (b) increased wage rate, and/or (c) decreased real ticket prices from not raising prices with increases in inflation.

(3) (a) Therefore, Wa is increased through (2a) and/or (2b), and/or (b) revenue from tickets is decreased or increased, depending on how attendance reacts.

The extent to which actions (2a), (2b), or (2c) are taken depends on the relative strengths of management and labor.

With these two scenarios, one can see how the system operates. For example, suppose the general wage level is increased; then Scenario I follows. In addition, there is an effect on ticket revenue. Or, for example, one can trace the effect of an increase in the general price level.

APPENDIX E

DIFFERENTIAL ECONOMIES AND A DECREASING SHARE OF ARTISTIC PERSONNEL COSTS*

Samuel Schwarz

I. Introduction[1/]

In their seminal work,[2/] Baumol and Bowen raised the issue of a persistently decreasing share of total costs being expended on artistic personnel and also discussed economies of scale, without connecting the two. The purpose of this note is to supply the missing link. We begin in Section II with a look at some possible reasons for the observed trend. This leads us to a discussion of the effect of differential economies of scale on a changing input mix and hence, a declining share of artistic personnel costs in Section III, while Section IV provides a brief conclusion.

II. A Decreasing Share of Artistic Personnel Costs

Over the years, there has been a fairly persistent trend in the expenditures of the major orchestras: a declining portion of total costs going to expenditures on artistic personnel. In fact, Baumol and Bowen already noticed this phenomenon and concluded at the end of Chapter IX:

> Artists' earnings are not the only component of cost of performance that has been rising. Indeed, other costs have grown more rapidly. In recent years, at any rate, expenditures on artistic personnel have been a declining portion of the total expenditures of the typical performing organization.

This persistent trend is somewhat puzzling. For there are two possible reasons for this occurence: 1) per-unit costs of the other factors of production have risen at a greater rate than that of artistic labor and/or 2) the units of other inputs have increased relative to those of artistic labor. If the former were the sole cause of the drop in the share of artistic personnel costs, it would imply an increase in the prices of other inputs at a rate far exceeding that of artistic labor.

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* Published as "Differential Economics and A Decreasing Share of Artistic Personnel Costs", Journal of Cultural Economics, pp. 27-31, Vol. 7, #1, June 1983.

To grasp the magnitude of the required increase, let us take a simple numerical example. Suppose that at $100 million of expenditures, the artistic-personnel/other-costs ratio was 60/40. Years later, at $200 million of expenditures, the ratio is 50/50. The amount of expenditures going to artistic personnel has increased from $60 million to $100 million—a 67% increase—while that for other costs has increased from $40 million to $100 million—a 150% increase. This implies that other costs have risen more than twice as fast as artistic personnel costs.

Since the per-unit cost of artistic labor in the major orchestras has increased sharply over much of this period—even outracing the increases in manufacturing wages during the decade of the 60's[3/]—it is highly implausible that the increase in per-unit costs of other inputs has been the sole reason for the decreasing ratio. This points, then, to an increasing proportion of other inputs of production. One possible explanation for this change in the input mix lies in the various economies of scale present in the orchestras.

III. Differential Economies of Scale and a Changing Input Mix

Baumol and Bowen discussed the existence of "economies of scale" and derived cost curves for each of their eleven major orchestras which supported their hypothesis. Globerman and Book,[4/] using a more elaborate equation, derived results similar to those of Baumol and Bowen. We need not, therefore, reprove the existence of such economies.

We want to look at another aspect: how differential economies of scale lead to a changing composition of factors of production. Although Baumol and Bowen also raised the problem of a decreasing percentage of total expenditures going to artistic personnel, they did not relate their treatment of economies of scale to this problem.

The connection will become apparent if we turn to their explanation of areas of economizing in the orchestras. After citing administration as one, they state (pp. 203-204):

> A more important opportunity to economize is presented by the possibility of making rehearsal time cover more performances. Suppose an orchestra has been running three series of identical programs per season and decides to run four. This will not add to the number of different pieces of music performed. Each item will now be repeated before four different audiences instead of three, and little, if any, increase in rehearsal time will be required. If rehearsal costs were $120,000 for the season with three series, the rehearsal cost per series would be $40,000 and with four series, it would fall to $30,000. Here, then, is an opportunity to achieve very substantial economies.

If we take this one step further, as the number of concerts are increasing, the costs for artistic personnel per concert are decreasing, while the facility maintenance 5/ and associated costs, e.g., ushers, guards, etc., per concert remain relatively constant. This, then, will result in a decreasing share of total cost going to artistic labor.

In addition, Baumol and Bowen found another piece of evidence which is of importance to us: a longer range of economies of scale for artistic personnel costs. In Appendix VIII-2, after deriving average-total-cost curves for their set of major orchestras, they state (pp. 480-481):

> We also undertook a parallel set of regressions, using expenditures on artistic personnel alone instead of total unit costs. There was then a marked improvement in results. . . The general shapes of the average cost curves remained much the same even though, perhaps a bit surprisingly, the minima now generally called for a somewhat larger number of concerts per season. This implies that unit administrative costs typically begin to increase at a number of concerts smaller than the turning point in expenditures on performers' salaries.

This, then, points to a decreasing share of artistic personnel costs vis-a-vis administrative costs. Interestingly, our previous explanation of the Baumol and Bowen hypothesis of rehearsal time economies seems to indicate the just-cited result which Baumol and Bowen found a bit surprising.

IV. Conclusion

We have shown that, with increasing output, differential levels of economy of scale in the various areas of arts expenditures may give rise to a changing input mix and hence, to differential growth in the share of total expenditures going to the different areas. But this need not be limited to economies of scale. Other types of differential economies can have the same effect. For example, if an arts organization "economizes" by reducing the number of performers for certain performances,[7/] it accomplishes the same result. It is interesting to note that decreasing the share of artistic personnel costs is one way of controlling the "cost-disease" besetting the arts.

Footnotes

[1] I would like to express my appreciation to Professor William J. Baumol for his review and helpful suggestion. Much of the work for this paper was done under a contract from the National Endowment for the Arts, NEA C 164, to the Center for Policy research. I am grateful to Mr. Harold Horowitz, NEA Research Division Director, for his patience and encouragement.

[2] Baumol, William J. and William G. Bowen, Performing Arts: The Economic Dilemma, New York: The Twentieth Century Fund, 1966.

[3] See Chapter III of A Model for the Analysis of the Performing Arts: A Case Study of the Major Orchestras, New York: Center for Policy Research, 1977.

[4] Globerman, S. and S.H. Book. "Statistical Cost Functions for Performing Arts Organizations," Southern Economic Journal, 40 (4) April 1974.

[5] Although depreciation on facility is a fixed cost and, hence, its cost per concert diminishes with an increase in the number of concerts, it is a negligible amount (less than 3% of all non-salary facility costs (6)).

[6] See The Finances of the Performing Arts, Vol. I New York: The Ford Foundation, 1974.

[7] e.g., the trend of smaller casts in the professional theater. See Anderson, Robert J. Jr. and Sonia P. Maltezou, "The Economic Condition of the Live Professional Theatre in America," Research in the Arts: Proceedings of the Conference on Policy Related Studies of the National Endowments for the Arts, Washington, D.C.: The National Endowment for the Arts, The Walters Art Gallery, Baltimore, 1977.

APPENDIX F

SPONSORS/PRESENTERS

For background important to the discussion that follows, the reader is directed to the discussions in Chapter 2 on the distinction between the arts producer and the sponsor/presenter and the problems encountered in trying to delineate that distinction. Sponsorship/presentation is a primary function to some organizations, and is a secondary one to many others that also function as producers. In this chapter, data on organizations that are identified primarily as sponsors or presenters and on others that include sponsorship/presentation among their functions are presented.

As with the data on producers, this appendix is organized by mutually exclusive types of organizations (to the extent possible), and then by the sources that presented relevant data for that type of organization. It should be noted that some of these sources offer no definitions or descriptions of the organizations included within the population described. Therefore, there are potentially hidden overlap problems that cross the categories as classified here. When these problems are known to exist in a particular data source, they are so identified.

Performing Arts Presenters/Arts Centers

The one data source that deals specifically with a category called presenters is the 1976 NRCA universe study.1/ Out of the 5,340 arts organizations represented in that universe, 162 were performing arts presenters (3 percent of the total universe and 6 percent of the 2,568 performing arts organizations included). In addition, 371 arts centers were represented (7 percent of the total) and 430 visual arts organizations (8 percent of the total).

The presenters and the arts centers were defined in the NRCA interview questionnaire as follows:

1/ National Research Center of the Arts, The Status of Nonprofit Arts and Museum Institutions in the United States in 1976. 1978.

- Performing arts presenters: Multi-function performing arts centers, community performing arts centers, concert halls, and other presenters whose function is to supply facilities, space, or equipment for performances.

- Art center: A multipurpose institution with a variety of arts disciplines/functions, including both presentation and collections in any one or more of a number of different categories.

As one can see from the two definitions presented above, the distinction between the two categories is not especially clear. Classification of organizations in this study was effected by interviewers through the use of the interview questionnaire. Therefore, as reported in the data, they do represent mutually exclusive organizations.

In the interview questionnaire, "Production of Visual Arts" and "Visual Arts Presenters" were captured in different places, with the latter classified along with museums. It is interesting to note that in the reporting of the data, these two categories were combined and presented separately from museums. They were not defined on the questionnaire. Therefore, both producers and presenters are reflected in the same category in the data.

In addition, the NRCA study presented separate figures for 501 neighborhood and community arts councils (9 percent of the total universe), defined as "organizations whose purposes are to provide services for the general advancement or support of the arts, such as calendars of information, training programs, management or support services." Although presentation is not clearly represented in this definition, other data sources indicate that it does occur under the auspices of this cateogry of organizations. Therefore, those figures will be presented later under the discussion of community arts agencies.

Since the visual arts category includes producers, it will not be represented here. NRCA data on budget size, total operating expenses, and total revenues for the presenters and arts centers are reflected in Figures F-1 and F-2.

PERFORMING ARTS PRESENTERS/ARTS CENTERS (1976) BY BUDGET SIZE

	Total Institutions		Presenters		Arts Centers	
	#	%	#	%	#	%
	5340	100	162	100	317	100
$50,000	2,577	48	89	55	151	41
$50,000 - $99,999	1,037	19	21	13	83	22
$100,000 - $249,999	972	18	22	14	102	27
$250,000 - $499,999	385	7	16	10	18	5
$500,000 - $999,999	137	3	5	3	11	3
$1,000,000 - $4,999,999	190	4	8	5	7	2
$5,000,000 +	44	1	2	1	—	—

Source: National Research Center for the Arts. *The Status of Nonprofit Arts and Museum Institutions in the United States in 1976*.

FIGURE F-1

PERFORMING ARTS PRESENTERS/ARTS CENTERS (1976)
OPERATING EXPENDITURES (EXPENSES)
($000's)

	Total Institutions (5,340)		Presenters (162)		Arts Centers (317)	
	$	%	$	%	$	%
TOTAL EXPENSES	$1,406,618	100	$52,648	100	$52,506	100
Average Expenses	263.4	—	325.0	—	141.5	—
Total Personnel*	843,970	60	24,745	47	27,303	52
Administrative	182,860	13	12,109	23	14,702	28
Performing (Salaried/Seasonal)	295,389	21	2,632	5	1,575	3
Performing (Per Performance)	182,860	13	5,265	10	3,675	7
Other Artistic	182,860	13	4,738	9	7,351	14
Direct Operating Expenses*	$562,647	40	$27,903	53	$25,203	48

*All dollar figures except TOTAL EXPENSES were calculated from the percents as reported by NRCA.

REVENUES (INCOME)

	$	%	$	%	$	%
TOTAL INCOME	$1,493,910	100	$54,174	100	$53,410	100
Earned	757,585	51	39,374	73	25,005	47
Private Support	300,336	20	7,462	14	12,614	24
Government Support	435,988	29	7,338	14	15,791	30

Source: The Status of Nonprofit Arts and Museum Institutions in the United States in 1976, National Research Center for the Arts

FIGURE F-2

In comparison with the universe, these data show that in terms of budget size, the presenters had a slightly higher proportion of organizations with budgets under $50,000 (55/48 percent), although there was also a slightly higher proportion between $250,000 and $500,000 (10/7 percent). The arts centers on the other hand, had a significantly higher proportion in the $100,000 to $250,000 range (27/18 percent).

An examination of the expense figures reveal that both the presenters and the arts centers were less labor intensive than the universe (47/60 percent and 52/60 percent, respectively). Within the personnel expenses, higher percentages were expended on administrative personnel (23/13 percent and 28/13 percent, respectively). These findings are not unexpected, since they are not producers. On the income side, the presenters had a significantly higher proportion of earned income (73/51 percent), which again would not be unexpected.

Performing (Theatrical) Facilities and Festivals

The 1978 MATHTECH study[2/] on live professional theater in its final report included figures for categories of theaters and facilities that could be considered to be presenters, in that they provided space and utilized outside artistic personnel. For categories other than facilities, however, the question of the level of involvement in the actual production of theatrical performances remains unanswered. Data for this study were obtained from a variety of secondary sources, as is discussed in Chapter 3.

The one category in the MATHTECH data that clearly describes outdoor performing facilities is "large musical arenas and hardtops," of which 30 were included. Another category of "outdoor festivals" (of which five were identified) may reasonably be assumed to also be presenters. Others that may be presenters as a secondary function are dinner theaters (128) and small summer stock theaters (310) (which included 140 located on college and university campuses and 64 nonprofit theaters, 65 commercial theaters, and 41 other companies). There were 309 facilities that were available for presentation of Broadway road shows, including civic centers (185), colleges and universities (87), and commercial facilities (37).

[2/] National Endowment for the Arts, Research Division, Report #11. Conditions and Needs of the Professional American Theater, 1981.

As previously noted, clear distinctions between profit and nonprofit theater activity were not made in the report. Therefore, the data presented here include both. Since totals are generated from these categories, it is assumed that they are mutually exclusive and that there is no overlap across categories.

Relevant data on these categories of presenting facilities are found summarized in Figure F-3. Although the MATHTECH report goes into detail on finances, the data were obtained from secondary sources and represent different groupings of theaters. Financial data for no category presented in Figure F-3 could be constructed from information in the report. Therefore, no financial data are included here.

Museums

In recent years (from the mid-1960s on), museums have increasingly functioned as sponsors/presenters of a variety of art forms in addition to their primary museum functions of collection, exhibition, and preservation of art and historical objects. This has occurred for several reasons, some economic, some aesthetic, some motivated by a desire to fill cultural gaps within the community served by the museum. In more recent years, they have also become producers of some of these art forms, in particular, some of the performing arts (chamber music) and some media arts (film, recordings).

Little information exists about this sponsorship activity, especially that which could be used to measure its level in economic terms. The involvement of museums in multi-disciplinary activity became a point of discussion in the middle to late sixties within the museum profession, as documented in a variety of papers presented at the 1966 annual meeting of the American Association of Museums (AAM). This material was published in the January 1967 issue of Museum News[3/] and was discussed in the 1968 publication America's Museums: The Belmont Report.[4/]

[3/] American Association of Museums, Museum News, January 1967.

[4/] American Association of Museums, America's Museums: The Belmont Report. A report on the Federal Council on the Arts and Humanities, Washington, D.C., 1968.

THEATRICAL PRESENTERS (1976-77)
PRODUCTIONS/PERFORMANCES/ATTENDANCES

Type of Facility	Number of Facilities	Number of Productions	Number of Performances	Estimated Attendance (In Millions)
Road (185 Civic Centers, 87 Colleges, 37 Commercial)	309	(not given)	9,000	14.7
Dinner (All for Profit)	128	1,280	32,000	11.1
Outdoor Summer Musical Theaters (Large Musical Arenas and Hardtops)	30	200	3,000	6.6
Summer Stock (140 Colleges, 64 Nonprofit, 65 Commercial, 41 Other)	310	1,200	22,000	4.9
Outdoor Festivals (53 Identified, data presented on 40)	40	40	2,000	1.7
TOTALS	707	12,720	68,000	39 million

Source: Research Report #11, The Condition and Needs of the Live Professional Theater in America, National Endowment for the Arts

FIGURE F-3

Some figures on the number of museums presenting programs in various artistic disciplines are included among the tables produced by the U.S. Office of Education in its 1969 report Museums and Related Institutions.[5] These data were based on a large-scale, nationwide statistical survey of museums conducted in 1966. Data on programmatic activities were presented for 2,889 museums reporting such activities. With the exception of two categories ("radio programs produced" and "TV programs produced"), it is not clear whether production by the museum is represented in the data.

The relevant categories that may represent presentation of other art forms by museums are summarized in Figure F-4. The primary value of these data are to indicate the number of museums that were involved in these activities and a measure of which activities were the most prevalent. Data are presented by two stratifications of museums: government authority and subject classification.

The data show that by and large there is little variation in involvement in these activities by governing authority, other than governmentally affiliated museums seem to have participated less than educationally related or other independent nonprofit institutions. Across the field, between 20 and 35 percent of all museums in the sample were involved in these activities. By subject classification, there are greater variations. Art museums and combined museums (many of which also include art as one of their classifications) have, by far, a greater involvement than the remainder (62.3 and 34.8 percent, respectively).

Generally, the film series activity was the most frequently cited presented event, followed closely by live musical events. Again, they are cited equally by art museums, and a greater proportion of art museums report involvement in them (35 percent as opposed to the average of 12.5 percent).

There are also some figures in NRCA's Museums U.S.A.[6] (1972 data) on revenues from "admissions to lectures, films, performances" and "attendance at performing arts

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[5] Lola Eriksen Rogers, Office of Education, U.S. Department of Health, Education, and Welfare, Museums and Related Institutions: A Basic Program Survey, 1969.

[6] National Endowment for the Arts, Museums U.S.A. 1974.

ARTS PROGRAMMING BY MUSEUMS (1966)

	Governing Authority										Subject Classification of Exhibits									
Activity	Total		Gov't		Educational Institution		Nonprofit		Other		Total		Art		History		Science		Combination	
	#	%	#	%	#	%	#	%	#	%	#	%	#	%	#	%	#	%	#	%
Live Musical Events	262	9.1	48	4.7	35	11.0	171	12.1	8	0.7	262	9.1	148	35.2	42	2.9	5	1.1	67	11.0
Drama Events	119	4.1	25	2.4	19	6.0	72	5.1	3	0.2	119	4.1	62	14.8	21	1.5	2	0.5	34	5.6
Dance Events	80	2.8	17	1.7	7	2.2	53	3.7	3	0.2	80	2.8	42	10.0	13	0.9	3	0.7	22	3.6
Film Series	361	12.5	106	10.3	39	12.2	205	14.5	11	0.9	361	12.5	144	34.3	59	4.1	70	16.0	88	14.5
Total Reporting Above Activities (1)	822	28.5	196	19.0	100	31.3	501	35.4	25	20.3	822	28.5	262	62.3	135	9.5	80	18.3	211	34.8
Total Reporting Any Educational/Cultural Activities (2)	2,538	87.9	864	83.9	291	91.2	1,282	90.5	101	82.1	2,538	87.9	400	95.2	1,187	83.4	395	90.2	556	91.6
Total In Sample	2,889	100.0	1,030	100.0	319	100.0	1,417	100.0	123	100.0	2,889	100.0	420	100.0	1,424	100.0	438	100.0	607	100.0

(1) Tables indicate that 277 museums reported no such activities, while 351 did not respond to the question.

(2) The same institution may be represented several times in each column since the question allowed multiple responses.

Source: Museums and Related Institutions, U.S. Office of Ecuation

FIGURE F-4

presentations." Tables 62 and 204 from that report are included here as Figures F-5 and F-6. Essentially, they show that 3 percent of the total attendance of 308,205,000 (or 9,246,150) at 1,821 museums included in the NRCA sample was to performing arts presentations. Of the total operating revenues of $150,090,000 for 1,821 museums, about 4 percent (or $5,588,000) represents revenues from admissions to lectures, films, and performances.

Generally, with regard to attendance at performing arts presentations, there was a small range of variation, with art museums, all museums with a budget under $50,000, and educationally related museums having a higher proportion in relation to the average of 3 percent (7, 6, and 6 percent, respectively). With regard to revenues from admissions to lectures, films, and performances, the most interesting figures are the higher proportion for the $50,000 to $100,000 and the $100,000 to $250,000 budget groups (12 percent and 7 percent, respectively) as opposed to the average of 4 percent, and those affiliated with municipal/county government or with public education institutions (14/18 percent and 23/11 percent, respectively).

The only specific source of data found on museums as sponsors of arts activity is found in Museum Sponsorship of Performing Arts,[7/] a study conducted in 1974 by Cynthia K. Mandl and Robert M. Kerr, research fellows at the Center for Arts Administration in the Graduate School of Business at the University of Wisconsin in Madison.

In this source, the role of the museum as a multi-disciplinary art center is described. In particular, its evolution from being a repository of collections of visual art to being a major sponsor of performing arts activities is discussed. The report briefly summarizes earlier documents that identify and further describe this process (including those mentioned at the beginning of this discussion) and attempts to document the sponsorship function more fully.

[7/] Mandl, C.K., and Kerr, R.M. Museum Sponsorship of the Performing Arts, Center for Arts Administration, University of Wisconsin, 1975.

Table 62

PROPORTION OF TOTAL ATTENDANCE BY TYPE OF ATTENDANCE
(Base: Total museums)

(1971-1972)

													Governing Authority:							
		Classification:					Size:							Government:				Educational Institutions:		
	Total	Art	History	Science	Art/ History	Other	Under $50,000	$50,000 to $99,999	$100,000 to $249,999	$250,000 to $499,999	$500,000 to $999,999	$1,000,000 and over	Private Non-Profit	Total	Federal	State	Municipal County	Total	Public	Private
	%	%	%	%	%	%	%	%	%	%	%	%	%	%	%	%	%	%	%	%
General attendance (30%)*	80	81	80	83	79	75	70	74	76	82	81	86	76	83	89	77	85	73	74	73
Elementary and secondary school classes (30%)*	15	10	17	14	16	17	21	20	19	13	15	11	18	13	8	21	11	18	16	22
Attendance at performing arts presentations (24%)*	3	7	1	2	4	6	6	5	3	3	3	2	4	3	3	1	3	6	7	3
Adult workshops and classes (27%)*	2	2	2	1	1	2	3	1	2	2	1	1	2	1	**	1	1	3	3	2

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* Proportion of museums in which results are based on actual counts rather than estimates.

** Less than 0.5%.

Source: Museums U.S.A., A Survey Report, National Research Center for the Arts

FIGURE F-5

Table 204
OPERATING REVENUES IN FISCAL 1971-1972
(Base: Total museums)
(Dollar amounts in thousands)

		Classification:					Size:					
	Total $/%	Art $/%	History $/%	Science $/%	Art/ History $/%	Other $/%	Under $50,000 $/%	$50,000 to $99,999 $/%	$100,000 to $249,999 $/%	$250,000 to $499,999 $/%	$500,000 to $999,999 $/%	$1,000,000 And Over $/%
General and special exhibit admissions	46,275 30	5,549 15	10,625 52	18,124 41	6,737 21	5,240 36	1,780 42	1,674 32	3,103 32	5,195 43	5,603 33	28,920 28
Admissions to lectures, films, performances	5,588 4	1,866 5	818 4	1,866 4	651 2	387 3	134 3	647 12	680 7	278 2	870 5	2,979 3
Tuition	9,092 6	7,429 20	2 *	886 2	72 *	703 5	264 6	442 8	899 9	848 7	1,279 8	5,360 5
Other program charges	4,149 3	907 2	426 2	2,412 5	67 *	337 2	182 4	148 3	378 4	242 2	323 2	2,876 3
Sales of articles and materials from museum shops and by other means	39,000 26	13,322 35	6,117 30	8,758 20	6,360 20	4,443 30	1,258 29	1,834 34	3,155 32	2,872 24	4,445 27	25,436 25
Restaurants and parking facilities and related activities	34,984 23	4,312 11	835 4	9,673 22	17,585 54	2,579 17	6 *	161 3	696 7	1,381 11	2,083 13	30,657 31
Fees for services to other museums	811 1	362 1	2 *	83 *	11 *	353 2	38 1	81 2	36 *	66 1	276 2	314 *
Miscellaneous	10,191 7	4,165 11	1,539 8	2,797 6	936 3	754 5	625 15	304 6	939 9	1,220 10	1,602 10	5,501 5
Total operating revenues	150,090	37,912	20,364	44,599	32,419	14,796	4,287	5,291	9,886	12,102	16,481	102,043

* Less than 0.5%

(continued)

Source: Museums U.S.A., A Survey Report, National Research Center for the Arts

FIGURE F-6

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F-13

Table 204
OPERATING REVENUES IN FISCAL 1971-1972 (continued)
(Base: Total museums)
(Dollar amounts in thousands)

		Governing Authority:							
			Government:				Educational Institutions:		
	Total	Private Non-Profit	Total	Federal	State	Municipal County	Total	Public	Private
	$/%	$/%	$/%	$/%	$/%	$/%	$/%	$/%	$/%
General and special exhibit admissions	46,275 30	36,228 29	9,714 40	332 11	5,042 60	4,340 34	333 14	152 14	181 14
Admissions to lectures, films, performances	5,588 4	3,412 3	1,908 8	87 3	105 1	1,716 14	268 11	260 23	8 1
Tuition	9,092 6	8,822 7	193 1	- -	25 *	168 1	77 3	5 *	72 5
Other program charges	4,149 3	3,756 3	289 1	- -	87 1	202 2	104 4	17 1	87 7
Sales of articles and materials from museum shops and by other means	39,000 26	33,257 27	4,696 20	973 33	1,350 16	2,373 19	1,047 43	594 54	453 33
Restaurants and parking facilities and related activities	34,984 23	28,652 23	6,272 26	1,451 49	1,521 18	3,300 26	60 2	50 5	10 1
Fees for services to other museums	811 1	632 1	65 *	- -	11 *	54 *	114 5	1 *	113 9
Miscellaneous	10,191 7	8,805 7	955 4	104 4	382 4	469 4	431 18	29 3	402 30
Total operating revenues	150,090	123,564	24,092	2,947	8,523	12,622	2,434	1,108	1,326

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* Less than 0.5%

(continued)

Source: Museums U.S.A., A Survey Report, National Research Center for the Arts

FIGURE F-6 (Continued)

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Mandl and Kerr used the 1973 edition of The American Association of Museums' Official Museum Directory to identify 746 organizations that specified music, drama, dance, poetry or arts festivals as being among their activities. (This figure also included some not strictly defined as museums: shrines, parks, libraries, foundations, etc.) Questionnaires were mailed to these organizations and usable responses were received from 124 of them (16.6 percent). (An additional 64 incomplete responses were received, most from organizations that in spite of the directory listing indicated that they did not sponsor any performing arts programs.) The Mandl and Kerr report documents that the respondents were basically representative of the population in terms of type. (Fifty percent were art museums, 40 percent were evenly divided between history or general museums, and the remainder included six science museums, two parks, and one zoo.) There were 12 Canadian museums among the respondents.

The questionnaire is included in the report. Although questions were asked on annual income and expenses and numbers of performances and attendance, no data were reported on these items, apparently because of response problems. This is not clearly explained in the report.

Colleges and Universities

The primary data source found on sponsorship/presentation by higher education institutions is the biennial membership survey conducted by the Association of College, University and Community Arts Administrators, Inc., or ACUCAA (formerly the Association of College and University Concert Managers, ACUCM). Its membership primarily consists of individuals who are arts administrators at colleges and universities. Data have been collected since the mid-1960s. This source does report the number of sponsored events and the total dollars expended for these events and attendance for the institutions the members represent. All these data are reported by artistic discipline, and are interesting from that standpoint for measuring change in institutional support for, and audience interest in, various types of artistic activity.

In 1975 the ACUCAA membership began to include some community arts agency administrators. Separate data on this group were presented in 1977 and 1979, thereby producing some overlap with other data sources, the membership surveys begun in

1979 by the National Assembly of Community Arts Agencies (NACAA) and a statistical profile of community arts agencies in 1976 (from a survey conducted by the American Council for the Arts). These data are presented in the next section.

The National Association of State Universities and Land Grant Colleges conducted a survey in 1978 on activities of their member institutions in the fine and applied arts. The findings include data on exhibitions/performances given on campus by outside professional artists.

Another data source on sponsorship by higher education institutions is a special survey on chamber music activity conducted in 1979 by the National Association of Schools of Music as a part of its annual member institution data collection. This source provides some specific information on sponsorship of professional chamber ensembles (touring groups).

ACUCAA

The data reported by ACUCAA were presented in a variety of ways over the decade, with some consistency from year to year but also some variation and inconsistency. Summary data for all years are presented in Figure F-7 and include total figures on number of respondents, number of events, expenses (total, artists and performance fees, other direct costs), ticket sales, and attendance. For two years only (1973 and 1975), figures were also reported on the amount of institutional subsidy, but this was obviously difficult to measure and was not maintained in future data collections; therefore, we have not included them. Averages were not reported in the data, but were calculated by dividing the number of respondents into the relevant total figures. In addition, beginning in 1977, figures were reported separately for colleges and universities and other nonprofit groups. Therefore, the summary data are shown separately in Figure F-7.

It should also be noted that by 1979 ACUCAA began to encounter response problems and divided the survey into separate components, which in turn were separately reported. Therefore, the number of responses to these separate surveys

ASSOCIATION OF COLLEGE, UNIVERSITY AND COMMUNITY ARTS ADMINISTRATORS
SUMMARY DATA FROM BIENNIAL PROFILE SURVEYS

	1970	1971	1973	1975	1977	1979	1977		1979	
							College/Univ.	Other NP	College/Univ.	Other NP
Total Number Institutions In Membership	360	339	312	406 (1)	526 (4)	714 (4)	364	162	424	282
Total Number Responses (2)	168	140	194	174(3)	169 (4)	113 (4)	136	33	74	39
Total Number Events	1,867	1,872	3,521	3,211	3,404	2,644	2,469	935	1,821	823
Average Number Events	11	13	18	18	20	23	18	28	25	21
TOTAL EXPENSES ($ spent) ($000's)	—	144.0 (5)	9,818.8(6)	10,493.4	13,054.8(6)	17,628.5(6)	10,907.0 (6)	2,147.8 (6)	13,310.0	4,318.6
Average Expenses	—	51.6	50.6	60.3	77.2	156.0	80.2	65.1	179.9	110.7
Total Artists'/Performance Fees	5,262.6	5,931.5	8,005.3	7,959.1	9,366.2	11,965.7	8,193.2	1,173.0	10,112.0	1,853.7
Average A/P Fees	31.3	42.4	41.3	45.7	55.4	105.9	60.2	35.5	136.6	47.5
(% of TOTAL EXPENSES)	—	(82)	(82)	(76)	(72)	(68)	(75)	(55)	(80)	(43)
Total Other Direct Costs	—	1,301.4	1,813.5	2,534.3 (7)	3,688.6	5,662.8	2,713.8	974.8	3,198.0	2,464.9
Average ODC's	—	9.3	9.3	14.6 (7)	21.8	50.1	20.0	29.5	43.2	63.2
(% of TOTAL EXPENSES)	—	(18)	(18)	(24)	(28)	(32)	(33)	(45)	(24)	(57)
TOTAL TICKET SALES ($000's)	—	(NA)	7,723.3	8,027.1	9,465.6	15,583.7	8,104.9	360.7	12,964.6	2,619.2
Average Ticket Sales	—	(NA)	39.8	46.1	56.0	137.9	60.0	10.9	175.2	67.2
TOTAL ATTENDANCE	—	2,499,017	3,394,963	3,186,916	2,779,920	2,723,456	2,287,900	492,020	2,070,613	652,843
Average Attendance	—	17,850	17,500	18,316	16,449	24,101	16,823	14,910	27,981	16,740

(1) Included are 340 colleges and universities and 66 other nonprofit organizations

(2) Subsidiary detail is sometimes based on a different number of responses. This is sometimes noted, but may not be at other times.

(3) This population includes 19 non-college/university groups. Data for this group were not reported separately, however.

(4) See Note (3) above. In 1977 and 1979, separate figures were reported, as presented above on the right.

(5) This figure was calculated from artists' fees.

(6) These figures were not reported, but were calculated by adding together the subsidiary detail.

(7) Based on 2,573 events for which ODC's were reported.

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FIGURE E-7

within the same year varies. In their first attempt at the 1979 survey (as reported in Profile Survey - VIII-A) of the 714 institutional members, 333 usable responses were received, of which 220 were colleges and universities and 113 were nonprofit arts organizations. Reponse on data items relevant for our purposes (expense, income, attendance) varied so greatly that a separate survey report was prepared (which included only 113 responses) in order to resolve this problem.

An examination of the data in Figure F-7, particularly the averages, shows a steady dramatic increase in all expense areas in actual dollars. With inflation taken into account ($1 in 1970 equaling $2.05 in 1980), the rate of increase is much smaller but still significant (about double from 1970 to 1980). The amount of revenues from ticket sales also increased at about the same rate, however. The percentages reflect that the proportion of other direct costs to total expenses also gradually increased with the passage of time (from 18 to 32 percent). Average attendance per institution remained about the same, except for a dramatic increase in the college/university group for 1979. This might be attributed to the inclusion in that year of a major university presenter not previously represented in the data, but no explanation for this can be found in the report.

There are some interesting differences between the college/university group and the other nonprofit groups for 1977 and 1979. A primary difference is that for the other nonprofit groups, the proportion of other direct costs to total expenses is dramatically higher, which is probably explained by the "hidden subsidy" provided by the parent institutions to the college/university groups. The subsidy most likely absorbs building and maintenance costs and some proportion of administrative expenses, including salaries.

Figures F-8 thrugh F-16 show the data reported by artistic discipline (programming) and, in the case of Figures F-13 through F-16, a breakdown of the 1977 and 1979 data for colleges and universities and for other nonprofit groups. The most interesting differences are found in the breakdowns for colleges/universities and other nonprofit groups.

ACUCAA BIENNIAL PROFILE SURVEYS
DATA ON PROGRAMMING BY ARTISTIC DISCIPLINE
NUMBER OF EVENTS/PERFORMANCES

	1970		1971		1973		1975		1977		1979	
	#	% (1)	#	%	#	%	#	%	#	%	#	%
Theater	353	(19)	268	(14)	505	(14)	408	(12)	546	(16)	296	(11)
Symphony	159	(9)	174	(9)	345	(10)	290	(9)	308	(9)	280	(10)
Rock	136	(7)	151	(8)	284	(8)	228	(7)	190	(6)	89	(3)
Popular (2)	163	(9)	136	(7)	—	—	—	—	—	—	—	—
Instrumental Recital	246	(13)	268	(14)	486	(14)	470	(15)	387	(11)	342	(13)
Ballet	96	(5)	88	(5)	145	(4)	138	(4)	179	(5)	285	(11)
Contemporary Dance	123	(7)	134	(7)	225	(6)	243	(8)	194	(6)	212	(8)
Chamber Music	237	(13)	182	(10)	388	(11)	414	(14)	399	(12)	359	(14)
Vocal Recital	94	(5)	82	(4)	258	(8)	221	(7)	202	(6)	93	(4)
Folk	133	(7)	113	(6)	262	(7)	265	(8)	217	(6)	103	(4)
Jazz	61	(3)	100	(6)	174	(5)	208	(6)	189	(6)	163	(6)
Opera & Choral	18	(1)	102	(6)	245	(7)	180	(6)	206	(6)	139	(5)
Dramatic Readings (3)	50	(3)	—	—	—	—	—	—	—	—	—	—
Folk/Ethnic (Dance) (4)	—	—	69	(3)	204	(6)	—	—	102	(3)	67	(3)
Big Name Entertainers	—	—	—	—	—	--	146	(4)	184	(5)	139	(5)
Mime	—	—	—	—	—	—	—	—	101	(3)	77	(3)
TOTAL	1,867	(100)	1,872	(100)	3,521	(100)	3,211	(100)	3,404	(100)	2,644	(100)

(1) % not reported in data

(2) 'Popular' became 'Big name entertainers'

(3) Category dropped after first year

(4) Combined with 'Folk' in 1970

NOTE: Separate figures were reported in 1977 and 1979 for the two subpopulations included in the data: colleges and universities and other nonprofit groups. These data are presented in Figures F-13 through F-16.

FIGURE F-8

ACUCAA BIENNIAL PROFILE SURVEYS
DATA ON PROGRAMMING BY ARTISTIC DISCIPLINE
ARTISTS' FEES ($000's)

	1970		1971		1973		1975		1977		1979	
	$ (1)	%	$	%	$	%	$	%	$	%	$	%
Theater	1,105.1	(21)	848.8	(14)	1,570.6	(19)	939.6	(12)	1,230.9	(13)	1,569.2	(13)
Symphony	789.4	(15)	868.8	(14)	1,076.9	(14)	972.7	(12)	1,436.0	(15)	1,639.4	(14)
Rock	736.8	(14)	936.8	(15)	976.1	(12)	1,114.1	(14)	1,574.9	(17)	2,261.3	(19)
Popular (2)	736.8	(14)	630.1	(11)	—	—	—	—	—	—	—	—
Instrumental Recital	368.4	(7)	597.5	(10)	569.3	(7)	524.0	(7)	519.1	(6)	545.8	(5)
Ballet	315.8	(6)	466.0	(8)	506.1	(6)	681.4	(8)	838.0	(9)	1,213.4	(10)
Contemporary Dance	263.1	(5)	329.6	(6)	456.0	(6)	792.4	(10)	609.4	(7)	812.0	(7)
Chamber Music	263.1	(5)	284.1	(5)	384.3	(5)	482.0	(6)	555.3	(6)	513.9	(4)
Vocal Recital	210.5	(4)	193.4	(3)	213.8	(3)	214.7	(3)	209.4	(2)	241.3	(2)
Folk	157.9	(3)	169.8	(4)	315.6	(4)	407.2	(5)	175.2	(2)	285.6	(2)
Jazz	105.3	(2)	181.4	(3)	310.0	(4)	408.5	(5)	453.5	(5)	418.6	(3)
Opera & Choral	105.3	(2)	217.2	(4)	659.3	(8)	627.9	(8)	761.1	(8)	977.4	(8)
Dramatic Readings (3)	52.6	(1)	—	—	—	—	—	—	—	—	—	—
Folk/Ethnic (Dance) (4)	—	—	207.9	(4)	967.4	(12)	794.6	(10)	261.9	(3)	218.0	(2)
Big Name Entertainers	—	—	—	—	—	—	—	—	632.4	(7)	856.7	(7)
Mime	—	—	—	—	—	—	—	—	109.2	(1)	413.0	(3)
TOTAL	5,262.6	(100)	5,931.5	(100)	8,005.3	(100)	7,959.1	(100)	9,366.2	(100)	11,965.7	(100)

(1) $ not reported in data, except for total

(2) 'Popular' became 'Big name entertainers'

(3) Category dropped after first year

(4) Combined with 'Folk' in 1970

NOTE: Separate figures were reported in 1977 and 1979 for the two subpopulations included in the data: colleges and universities and other nonprofit groups. These data are presented in Figures F-13 through F-16.

FIGURE F-9

ACUCAA BIENNIAL PROFILE SURVEYS
DATA ON PROGRAMMING BY ARTISTIC DISCIPLINE
OTHER DIRECT COSTS ($000's)

	1970		1971		1973		1975		1977		1979	
	$	%	$	%	$	%	$	%	$	%	$	%
Theater	—	—	—	—	349.1	(13)	319.9	(13)	466.4	(13)	742.5	(13)
Symphony	—	—	—	—	280.7	(15)	318.5	(15)	513.9	(19)	493.8	(9)
Rock	—	—	—	—	145.7	(8)	181.9	(7)	778.8	(21)	1,314.1	(23)
Popular (1)	—	—	—	—	—	—	—	—	—	—	—	—
Instrumental Recital	—	—	—	—	138.3	(8)	192.7	(8)	188.9	(5)	254.0	(4)
Ballet	—	—	—	—	119.1	(7)	303.1	(12)	263.1	(7)	655.4	(12)
Contemporary Dance	—	—	—	—	131.4	(7)	278.5	(11)	239.1	(6)	367.8	(6)
Chamber Music	—	—	—	—	89.0	(5)	151.0	(6)	273.2	(7)	238.9	(4)
Vocal Recital	—	—	—	—	34.5	(2)	58.7	(2)	43.7	(1)	76.3	(1)
Folk	—	—	—	—	103.0	(6)	163.2	(6)	61.5	(2)	95.5	(2)
Jazz	—	—	—	—	61.3	(3)	131.4	(5)	175.5	(5)	150.9	(3)
Opera & Choral	—	—	—	—	125.4	(7)	171.6	(7)	252.7	(7)	557.9	(10)
Dramatic Readings (2)	—	—	—	—	—	—	—	—	—	—	—	—
Folk/Ethnic (Dance) (3)	—	—	—	—	—	—	—	—	130.6	(4)	110.9	(2)
Big Name Entertainers	—	—	—	—	235.5	(13)	203.8	(8)	255.6	(7)	414.7	(7)
Mime	—	—	—	—	—	—	—	—	44.9	(1)	190.1	(3)
TOTAL	—	—	—	—	1,813.5	(100)	2,534.3	(100)	3,688.6	(100)	5,662.8	(100)

(1) 'Popular' became 'Big name entertainers'

(2) Category dropped after first year

(3) Combined with 'Folk' in 19[illegible]

NOTE: Separate figures were reported in 1977 and 1979 for the two subpopulations included in the data: colleges and universities and other nonprofit groups. These data are presented in Figures F-13 through F-16.

F-20

FIGURE F-10

ACUCAA BIENNIAL PROFILE SURVEYS
DATA ON PROGRAMMING BY ARTISTIC DISCIPLINE
TICKET SALE REVENUE ($000's) (1)

	1970		1971		1973		1975		1977		1979	
	$	%	$	%	$	%	$	%	$	%	$	%
Theater	—	—	—	—	1,505.1	(19)	837.6	(11)	1,271.7	(13)	2,015.9	(13)
Symphony	—	—	—	—	784.6	(11)	763.2	(9)	1,249.0	(13)	1,519.1	(10)
Rock	—	—	—	—	1,413.2	(18)	1,500.6	(19)	1,901.9	(20)	4,748.0	(30)
Popular (2)	—	—	—	—	—	—	—	—	—	—	—	—
Instrumental Recital	—	—	—	—	512.3	(7)	491.9	(6)	579.8	(6)	567.8	(4)
Ballet	—	—	—	—	481.2	(6)	856.4	(11)	864.5	(9)	1,345.2	(9)
Contemporary Dance	—	—	—	—	328.0	(4)	664.3	(8)	462.8	(5)	705.5	(5)
Chamber Music	—	—	—	—	241.3	(3)	324.1	(4)	503.8	(5)	454.1	(3)
Vocal Recital	—	—	—	—	157.6	(2)	148.8	(2)	146.1	(2)	203.6	(7)
Folk	—	—	—	—	351.7	(5)	428.9	(5)	171.6	(2)	338.7	(2)
Jazz	—	—	—	—	231.9	(3)	428.5	(5)	460.5	(5)	583.6	(4)
Opera & Choral	—	—	—	—	602.5	(8)	665.1	(8)	806.4	(9)	995.6	(6)
Dramatic Readings (3)	—	—	—	—	—	—	—	—	—	—	—	—
Folk/Ethnic (Dance) (4)	—	—	—	—	—	—	—	—	308.2	(3)	253.2	(2)
Big Name Entertainers	—	—	—	—	1,114.1	(14)	918.3	(12)	721.3	(8)	1,271.6	(8)
Mime	—	—	—	—	—	—	—	—	71.9	(1)	581.6	(4)
TOTAL	—	—	—	—	7,723.3	(100)	8,027.1	(100)	9,465.6	(100)	15,583.7	(100)

(1) Not reported prior to 1973

(2) 'Popular' became 'Big name entertainers'

(3) Category dropped after first year

(4) Combined with 'Folk' in 1970

NOTE: Separate figures were reported in 1977 and 1979 for the two subpopulations included in the data: colleges and universities and other nonprofit groups. These data are presented in Figures F-13 through F-16.

FIGURE F-11

ACUCAA BIENNIAL PROFILE SURVEYS
DATA ON PROGRAMMING BY ARTISTIC DISCIPLINE
ATTENDANCE

	1970		1971		1973		1975		1977		1979	
	#	%	#	%	#	%	#	%	#	%	#	%
Theater	—	—	351,899	(14)	506,179	(15)	304,741	(10)	385,890	(14)	307,378	(13)
Symphony	—	—	295,908	(12)	432,560	(13)	290,945	(9)	337,263	(12)	432,397	(16)
Rock	—	—	470,375	(19)	580,591	(17)	951,251	(30)	596,860	(22)	417,462	(15)
Popular (2)	—	—	318,815	(13)	—	—	—	—	—	—	—	—
Instrumental Recital	—	—	209,833	(8)	282,421	(8)	226,400	(7)	178,030	(6)	143,390	(5)
Ballet	—	—	143,139	(6)	218,710	(6)	185,132	(6)	196,570	(7)	205,262	(8)
Contemporary Dance	—	—	127,688	(5)	168,096	(5)	253,963	(8)	138,770	(5)	181,581	(7)
Chamber Music	—	—	90,300	(4)	177,916	(5)	142,375	(4)	154,630	(6)	140,629	(5)
Vocal Recital	—	—	52,372	(2)	82,818	(2)	77,866	(2)	60,910	(2)	62,610	(2)
Folk	—	—	125,887	(5)	199,403	(6)	184,488	(6)	60,440	(2)	86,157	(3)
Jazz	—	—	114,930	(5)	132,213	(4)	157,435	(5)	168,000	(6)	145,461	(5)
Opera & Choral	—	—	105,347	(4)	234,857	(7)	157,268	(5)	152,910	(6)	157,966	(6)
Dramatic Readings (3)	—	—	—	—	—	—	—	—	—	—	—	—
Folk/Ethnic (Dance) (4)	—	—	92,246	(4)	—	—	—	—	92,520	(2)	62,188	(2)
Big Name Entertainers	—	—	—	—	379,199	(11)	255,052	(8)	203,500	(7)	219,518	(8)
Mime	—	—	—	—	—	—	—	—	53,630	(2)	101,457	(4)
TOTAL	—	—	2,499,017	(100)	3,394,963	(100)	3,186,916	(100)	2,779,900	(100)	2,723,456	(100)

(1) Attendance not reported in 1970

(2) 'Popular' became 'Big name entertainers'

(3) Category dropped after first year

(4) Combined with 'Folk' in 1970

NOTE: Separate figures were reported in 1977 and 1979 for the two subpopulations included in the data: colleges and universities and other nonprofit groups. These data are presented in Figures F-13 through F-16.

FIGURE F-12

ACUCAA DATA FOR 1977
COLLEGES/UNIVERSITIES

N = 136	Artists' Fees		Other Direct Costs		Ticket Sales Revenue		Number of Events		Attendance	
	$	%	$	%	$	%	#	%	#	%
Theater	1,053.1	(13)	368.2	(14)	1,059.3	(13)	326	(13)	305,310	(13)
Symphony	1,274.4	(16)	240.5	(9)	1,025.0	(13)	772	(7)	232,660	(10)
Rock	1,072.5	(13)	431.4	(16)	1,300.2	(16)	166	(7)	460,560	(20)
Instrumental Recital	501.6	(6)	178.1	(7)	494.7	(6)	306	(12)	170,130	(7)
Ballet	810.8	(10)	256.9	(9)	842.6	(10)	151	(6)	187,890	(8)
Contemporary Dance	592.9	(7)	234.9	(9)	458.2	(6)	178	(7)	133,610	(6)
Chamber Music	499.0	(6)	193.8	(7)	430.4	(5)	269	(11)	128,210	(8)
Vocal Recital	183.0	(2)	38.8	(1)	121.1	(1)	167	(7)	54,120	(2)
Folk	169.9	(2)	60.8	(2)	167.6	(2)	200	(8)	56,780	(2)
Jazz	427.1	(5)	163.5	(6)	448.4	(6)	142	(6)	146,200	(7)
Opera & Choral	724.6	(9)	240.9	(9)	771.7	(10)	118	95)	140,210	(7)
Folk/Ethnic Dance	250.6	(3)	125.9	(5)	301.8	(4)	87	(3)	83,720	(4)
Big Name Entertainers	534.8	(7)	141.4	(5)	607.7	(7)	115	(5)	149,650	(7)
Mime	98.7	(1)	38.8	(1)	76.1	(1)	72	(3)	39,450	(2)
TOTAL	8,193.2	(100)	2,713.8	(100)	8,104.9	(100)	2,469	(100)	2,287,900	(100)

GENERAL NOTE: Except for the number of events, percents were not reported in the data.

FIGURE F-13

ACUCAA DATA FOR 1977
OTHER NONPROFIT GROUPS

N = 33	Artists' Fees		Other Direct Costs		Ticket Sales Revenue		Number of Events		Attendance	
	$	%	$	%	$	%	#	%	#	%
Theater	177.8	(15)	98.3	(1)	212.4	(16)	220	(23)	80,580	(16)
Symphony	161.6	(14)	538.2	(55)	224.0	(16)	136	(15)	104,600	(21)
Rock	502.4	(43)	82.5	(8)	601.7	(44)	24	(2)	136,300	(28)
Instrumental Recital	17.5	(1)	10.8	(1)	25.1	(2)	81	(9)	7,900	(21)
Ballet	27.0	(2)	6.2	(1)	21.9	(2)	28	(3)	8,680	(2)
Contemporary Dance	16.5	(1)	4.8	(>1)	4.6	—	16	(2)	5,160	(1)
Chamber Music	56.3	(5)	78.4	(8)	73.3	(5)	130	(14)	24,420	(5)
Vocal Recital	26.4	(2)	4.9	(>1)	25.1	(2)	35	(4)	1,790	(1)
Folk	5.3	(>1)	.8	—	4.0	—	17	(2)	3,660	(>1)
Jazz	26.5	(2)	12.0	(1)	12.1	(1)	47	(5)	21,800	(5)
Opera & Choral	36.5	(3)	11.8	(1)	34.7	(3)	88	(9)	12,700	(3)
Folk/Ethnic Dance	11.3	(1)	4.7	(>1)	6.5	—	15	(2)	9,400	(2)
Big Name Entertainers	97.5	(8)	114.3	(12)	113.6	(8)	69	(7)	53,850	(11)
Mime	10.5	(1)	6.2	(1)	1.8	—	29	(3)	14,180	(3)
TOTAL	1,173.0	(100)	974.8	(100)	1,360.7	(100)	935	(100)	492,020	(100)

GENERAL NOTE: Except for the number of events, percents were not reported in the data.

FIGURE F-14

ACUCAA DATA FOR 1979
COLLEGES/UNIVERSITIES

N = 74	Artists' Fees		Other Direct Costs		Ticket Sales Revenue		Number of Events		Attendance	
	$	%	$	%	$	%	#	%	#	%
Theater	1,306.5	(13)	550.8	(17)	1,526.4	(12)	258	(14)	275,094	(13)
Symphony	1,223.9	(12)	226.6	(7)	937.0	(7)	167	(9)	229,308	(11)
Rock	2,258.2	(12)	491.4	(15)	4,742.9	(37)	85	(5)	415,836	(20)
Instrumental Recital	471.0	(5)	175.3	(5)	481.9	(4)	288	(16)	118,205	(6)
Ballet	1,021.7	(10)	359.8	(11)	1,064.4	(8)	116	(6)	161,563	(8)
Contemporary Dance	761.8	(8)	308.0	(10)	645.1	(5)	187	(10)	170,280	(8)
Vocal Recital	231.7	(2)	74.6	(2)	196.7	(2)	82	(4)	57,889	(3)
Folk	265.3	(2)	88.8	(3)	319.2	(4)	84	(5)	77,019	(4)
Jazz	344.8	(3)	117.3	(4)	478.3	(4)	106	(4)	112,195	(6)
Opera & Choral	689.9	(7)	236.6	(7)	740.7	(6)	76	(4)	92,167	(5)
Folk/Ethnic Dance	193.0	(1)	101.5	(3)	233.8	(2)	57	(3)	53,170	(3)
Big Name Entertainers	547.2	(5)	141.1	(4)	702.5	(6)	66	(4)	118,122	(6)
Mime	401.7	(4)	185.6	(6)	574.7	(5)	57	(3)	94,387	(5)
TOTAL	10,112.0	(100)	3,198.0	(100)	12,964.6	(100)	1,821	(100)	2,070,613	(100)

GENERAL NOTE: Except for the number of events, percents were not reported in the data.

FIGURE F-15

ACUCAA DATA FOR 1979
OTHER NONPROFIT GROUPS

N = 39	Artists' Fees		Other Direct Costs		Ticket Sales Revenue		Number of Events		Attendance	
	$	%	$	%	$	%	#	%	#	%
Theater	262.7	(14)	191.8	(8)	489.6	(19)	38	(5)	92,284	(14)
Symphony	415.6	(22)	1,087.4	(44)	582.1	(22)	113	(14)	203,089	(31)
Rock	3.1	—	2.4	—	5.0	—	4	—	1,626	—
Instrumental Recital	74.8	(4)	78.7	(3)	85.9	(3)	54	(7)	25,185	(4)
Ballet	191.7	(10)	295.6	(12)	280.8	(11)	169	(21)	43,699	(7)
Contemporary Dance	50.3	(3)	59.8	(2)	60.4	(2)	25	(3)	11,301	(2)
Chamber Music	118.5	(6)	98.2	(4)	133.3	(5)	167	(20)	45,251	(7)
Vocal Recital	9.7	—	1.7	—	6.9	—	11	(1)	4,721	(1)
Folk	20.3	(1)	6.8	—	19.5	—	19	(2)	9,138	(1)
Jazz	73.9	(4)	33.0	(1)	105.3	(4)	57	(7)	33,266	(5)
Opera & Choral	287.6	(16)	321.3	(13)	254.9	(10)	63	(8)	65,799	(10)
Folk/Ethnic Dance	25.0	(1)	9.4	—	19.5	—	10	(1)	9,018	(1)
Big Name Entertainers	309.5	(17)	273.6	(11)	569.2	(22)	73	(9)	101,396	(16)
Mime	11.3	(>1)	4.5	—	6.0	—	20	(2)	7,070	(1)
TOTAL	1,853.7	(100)	2,464.9	(100)	2,619.2	(100)	823	(100)	652,843	(100)

GENERAL NOTE: Except for the number of events, percents were not reported in the data.

FIGURE F-16

For symphony performances in 1977, the other nonprofit groups bore significantly higher other direct costs (55/9 percent) as well as a higher ratio of attendance (21/10 percent) than the colleges and universities. For rock music performances, this group had a higher proportion of artist's fees (43/13 percent) and ticket sale revenues (44/16 percent). However, colleges and universities had slightly higher costs, revenues, and attendance at ballet performances (10/2 percent, 9/1 percent, 10/2 percent, 6/3 percent, and 8/2 percent, respectively). In 1979, the same was true with regard to symohony performances, with all of the figures reflecting higher proportions for the other nonprofit groups: artist's fees (22/12 percent, other direct costs (44/7 percent), ticket sales (22/7 percent), number of events (14/9 percent), and attendance (31/11 percent).

For rock music performances, the figure for nonprofit groups dramatically changes in 1979, possibly indicating that a significant presenter of rock concerts dropped out of the activity. Also in 1979, a higher proportion of nonprofit groups presented ballet (21/6 percent). They also had higher proportions for opera and choral presentation fees (16/7 percent), other direct costs (13/7 percent), ticket sales (10/6 percent), number of events (8/4 percent), and attendance (10/5 percent). The same is true for the presentation of big name entertainers: fees (17/5 percent), other direct costs (11/4 percent), ticket sales (22/6 percent), events (9/4 percent), and attendance (16/6 percent).

In 1974, ACUCAA also conducted a special survey of its membership on indirect costs associated with the presentation of professional touring performing arts. The results were presented in their publication College and University Support of the Professional Touring Performing Arts. The purpose of the survey was to determine how much of a financial subsidy was provided by the institution for support of this activity.

The report states that colleges and universities may constitute 70 percent of the touring market for professional performing arts groups that tour. The basic premise of the study was that the indirect costs are often hidden costs, buried in administrative budgets. As such, they are difficult to measure but of interest if one wishes to determine the true cost of the activity.

The survey was sent to 396 ACUCAA members, with usable responses received from 122. The survey collected data on three areas: direct program costs (fees, hall use, programs, advertising, etc.), indirect costs (faculty and staff salaries and general operation expenses such as supplies, utilities, maintenance, etc.), and income sources (ticket sales, student/activity fees, NEA, State and regional arts councils, foundations, corporations, individuals, etc.), including administrative funding from the institution. The information was intended to represent classical programming only (symphony, chamber music, ballet, theater, vocal and instrumental recitals, contemporary dance, opera, and choral music).

An assessment of the representativeness of the sample was made by comparing the survey respondents with the 1973 Profile Survey population for geographic distribution and type of institution. Generally, the survey group was found to parallel the other population along these characteritics. By extrapolation, the survey results were projected to the membership of 396 institutions. The result and the projections are presented in Figures F-17 through F-22. The data are presented by governing authority (public versus private) and school enrollment (small: less than 3,000; medium: 3,000 to 10,000; and large: over 10,000). Based on the Profile Survey results for previous years, ACUCAA estimated that classical programming accounted for 66 percent of total program costs and 60 percent of revenues. Also, a surplus/deficit has been calculated to which administrative funds were added to indicate a total amount of institutional subsidy.

For purposes of comparison, in Figure F-23 the total cost and total income figures have been summarized and averages calculated. In Figure F-24, ratios of direct and indirect costs to total costs, of income sources to total income, and of total income to total costs have been calculated.

The figures show that as a proportion of total income, ticket sales represent 53 percent of the total, with other outside sources accounting for an additional 26 percent and administrative funds accounting for the remaining 21 percent. By type of institution, the ratios are very similar, with the greatest variations being for private schools. For them, costs are better covered by more ticket sales revenue (51

ACUCAA - SPECIAL SURVEY
SUPPORT OF PROFESSIONAL TOURING PERFORMING ARTS
EXPENDITURES AND SUBSIDIES

Classification of Sample: Total

Extrapolation Factor: 3.246 (396/122)

Category	Survey Results	ACUCAA-Classical (extrapolated)	ACUCAA-Total Program (extrapolated)
Costs			
Direct Costs	$9,066,702	$29,430,514	$44,591,687
Indirect Costs	6,288,304	20,411,834	30,927,021
Total Costs	15,355,006	49,842,348	75,518,708
Income			
Ticket Sales	6,730,740	21,847,982	36,413,303
Other Income	3,305,834	10,730,737	17,884,561
Administrative Funds	2,648,010	8,595,440	14,325,734
Total Income	12,684,584	41,174,159	68,623,598
Unaccountable Deficit/(Surplus)	2,670,422	8,668,189	6,895,110

Unaccountable Deficit/(Surplus)	$2,670,422	$8,668,189	$6,895,110
Administrative Funds	2,648,010	8,595,440	14,325,734
Total Administrative Subsidy	5,318,432	17,263,629	21,220,844
Average Subsidy	$ 43,594	$ 43,594	$ 53,588

Source: College and University Support of the Professional Touring Performing Arts, Association of College, University and Community Arts Administrators

FIGURE F-17

ACUCAA - SPECIAL SURVEY
SUPPORT OF PROFESSIONAL TOURING PERFORMING ARTS
EXPENDITURES AND SUBSIDIES

Classification of Sample: State-Supported Schools

Extrapolation Factor: 3.122 (281/90)

Category	Survey Results	ACUCAA-Classical (extrapolated)	ACUCAA-Total Program (extrapolated)
Costs			
Direct Costs	$7,011,990	$21,891,432	$33,168,830
Indirect Costs	5,000,220	15,610,686	23,652,554
Total Costs	12,012,210	37,502,118	56,821,390
Income			
Ticket Sales	5,027,040	15,2[illegible]1,418	26,157,363
Other Income	2,943,630	9,190,012	15,316,687
Administrative Funds	1,954,350	6,101,481	10,169,134
Total Income	9,925,020	30,965,911	51,643,184
Unaccountable Deficit/(Surplus)	2,087,190	6,516,207	5,178,206

Unaccountable Deficit/(Surplus)	$2,087,190	$6,516,207	$5,178,206
Administrative Funds	1,954,350	6,101,481	10,169,134
Total Administrative Subsidy	4,041,540	[illegible]2,617,688	15,347,340
Average Subsidy	$ 44,906	$ 44,906	$ 54,617

Source: College and University Support of the Professional Touring Performing Arts, Association of College, University and Community Arts Administrators

FIGURE F-18

ACUCAA - SPECIAL SURVEY
SUPPORT OF PROFESSIONAL TOURING PERFORMING ARTS
EXPENDITURES AND SUBSIDIES

Classification of Sample: Private Institutions

Extrapolation Factor: 3.594 (115/32)

Category	Survey Results	ACUCAA-Classical (extrapolated)	ACUCAA-Total Program (extrapolated)
Costs			
Direct Costs	$2,054,688	$7,384,549	$11,188,710
Indirect Costs	1,288,256	4,629,992	7,015,139
Total Costs	3,342,944	12,014,541	18,203,849
Income			
Ticket Sales	1,703,712	6,123,141	10,205,234
Other Income	362,400	1,302,466	2,170,776
[illegible]inistrative Funds	693,728	2,493,258	4,155,431
Total Income	2,759,840	9,918,865	16,531,441
Unaccountable Deficit/(Surplus)	583,104	2,095,676	1,672,408
Unaccountable Deficit/(Surplus)	$ 583,104	$2,095,676	$1,672,408
Administrative Funds	693,728	2,493,258	4,155,431
Total Administrative Subsidy	1,276,832	4,588,934	5,827,839
Average Subsidy	$ 11,103	$ 11,103	$ 50,676

Source: College and University Support of the Professional Touring Performing Arts, Association of College, University and Community Arts Administrators

FIGURE F-19

ACUCAA - SPECIAL SURVEY
SUPPORT OF PROFESSIONAL TOURING PERFORMING ARTS
EXPENDITURES AND SUBSIDIES

Classification of Sample: Small Schools (less than 3,000 students)

Extrapolation Factor: 4.1 (123/30)

Category	Survey Results	ACUCAA-Classical (extrapolated)	ACUCAA-Total Program (extrapolated)
Costs			
Direct Costs	$1,522,770	$6,243,357	$9,459,632
Indirect Costs	967,410	3,966,381	6,009,668
Total Costs	2,490,180	10,209,738	15,469,300
Income			
Ticket Sales	1,261,200	5,170,920	8,618,200
Other Income	452,190	1,853,979	3,089,965
Administrative Funds	408,930	1,676,613	2,794,355
Total Income	2,122,320	8,701,512	14,502,520
Unaccountable Deficit/(Surplus)	367,860	1,508,226	966,780
Unaccountable Deficit/(Surplus)	$ 367,860	$1,508,226	$ 966,780
Administrative Funds	408,930	1,676,613	2,794,355
Total Administrative Subsidy	776,790	3,184,839	3,761,135
Average Subsidy	$ 25,893	$ 25,893	$ 30,578

Source: College and University Support of the Professional Touring Performing Arts, Association of College, University and Community Arts Administrators

FIGURE F-20

ACUCAA - SPECIAL SURVEY
SUPPORT OF PROFESSIONAL TOURING PERFORMING ARTS
EXPENDITURES AND SUBSIDIES

Classification of Sample: Medium Schools (3,000-10,000 students)

Extrapolation Factor: 3.857 (135/35)

Category	Survey Results	ACUCAA-Classical (extrapolated)	ACUCAA-Total Program (extrapolated)
Costs			
Direct Costs	$1,140,090	$4,397,327	$6,662,617
Indirect Costs	656,565	2,532,371	3,836,926
Total Costs	1,796,655	6,929,698	10,499,543
Income			
Ticket Sales	528,640	2,038,964	3,398,274
Other Income	653,275	2,519,682	4,199,469
Administrative Funds	361,515	1,394,363	2,323,939
Total Income	1,543,430	5,953,009	9,921,682
Unaccountable Deficit/(Surplus)	253,225	976,689	577,681

Unaccountable Deficit/(Surplus)	$ 253,225	$ 976,689	$ 577,681
Administrative Funds	361,515	1,394,363	2,323,939
Total Administrative Subsidy	614,740	2,371,052	2,901,620
Average Subsidy	$ 17,564	$ 17,564	$ 21,493

Source: College and University Support of the Professional Touring Performing Arts, Association of College, University and Community Arts Administrators

FIGURE F-21

ACUCAA - SPECIAL SURVEY
SUPPORT OF PROFESSIONAL TOURING PERFORMING ARTS
EXPENDITURES AND SUBSIDIES

Classification of Sample: Large Schools (over 10,000 students)

Extrapolation Factor: 2.421 (138/57)

Category	Survey Results	ACUCAA-Classical (extrapolated)	ACUCAA-Total Program (extrapolated)
Costs			
Direct Costs	$6,403,836	$15,503,686	$23,490,433
Indirect Costs	4,664,310	11,292,294	17,109,536
Total Costs	11,068,146	26,795,980	40,599,969
Income			
Ticket Sales	4,940,817	11,961,717	19,936,195
Other Income	2,200,428	5,327,236	8,878,727
Administrative Funds	1,877,637	4,545,759	7,576,265
Total Income	9,018,882	21,834,712	36,391,187
Unaccountable Deficit/(Surplus)	2,049,264	4,961,268	4,208,782

Unaccountable Deficit/(Surplus)	$2,049,264	$4,961,268	$4,208,782
Administrative Funds	1,877,637	4,545,759	7,576,265
Total Administrative Subsidy	3,926,901	9,507,027	11,785,047
Average Subsidy	$ 68,893	$ 68,893	$ 85,399

Source: College and University Support of the Professional Touring Performing Arts, Association of College, University and Community Arts Administrators

FIGURE F-22

ACUCAA - 1974 SPECIAL SURVEY
SUMMARY OF TOTAL AND AVERAGE COSTS AND INCOME

		Percent of Total Number	Total Costs ($000's)		Average Costs ($000's)	Total Income ($000's)		Average Income ($000's)
			$	%		$	%	
OTAL SAMPLE	(122)	100.0	15,355.0	100.0	125.9	12,684.6	100.0	104.0
ate Schools	(90)	73.8	12,012.2	78.2	133.5	9,915.0	78.2	110.3
ivate Schools	(32)	26.2	3,342.9	21.8	104.5	2,759.8	21.8	86.2
all Schools	(30)	24.6	2,490.2	16.2	83.0	2,122.3	16.7	70.7
edium Schools	(35)	28.7	1,746.7	11.4	49.9	1,543.4	12.2	44.1
rge Schools	(57)	46.7	11,068.1	72.1	194.2	9,018.9	71.1	158.2

urce: *College and University Support of the Professional Touring Performing Arts*, Association of College, University and Community Arts Administrators

FIGURE F-23

ACUCAA - 1974 SPECIAL SURVEY
RATIOS (IN PERCENTS) OF COSTS AND INCOME

	All Schools (122)	State (90)	Private (32)	Small (30)	Medium (35)	Large (57)
Total Costs	100%	100%	100%	100%	100%	100%
Direct	59	58	61	61	63	58
Indirect	41	42	39	39	37	42
Total Income	100%	100%	100%	100%	100%	100%
Ticket Sales	53	51	62	60	34	55
Other Income	26	30	13	21	42	24
Administrative Funds	21	20	25	19	23	21
ncome as % of Total Costs						
Total Income	83%	83%	83%	85%	85%	82%
Ticket Sales	44	42	51	51	29	45
Other Income	22	25	11	18	36	20
Administrative Funds	17	16	21	16	20	17

Source: College and University Support of the Professional Touring Performing Arts, Association of College, University and Community Arts Administrators

FIGURE F-24

percent), with less income from other sources (11 percent) and slightly more from administrative funds (21 percent). By size, there is slightly more variation with the medium and small schools having higher ratios of direct to indirect costs (63/37 percent and 61/38 percent, respectively). There are significant differences between them for ticket sales revenue, with the small schools receiving much more and the medium schools much less (60/34 percent), and the medium schools receiving much more from outside sources (42/21 percent).

With regard to size of enrollment, the figures for small schools look very similar to those for private schools, possibly indicating that a high degree of overlap may exist between those two groups (i.e., that most small schools are private institutions). Similarly, the figures for large schools look much like those for the state schools, implying that many large schools are also state schools.

National Associaton of State Universities and Land-Grant Colleges

The Fine Arts Commission of the National Association of State Universities and Land-Grant Colleges conducted a survey in May 1978 of its member institutions in order to document their work in the fine and applied arts. The survey covered such areas as administrative arrangements for the arts, curricular activities, enrollment, faculty, continuing education resources and facilities, arts programming, and sources of support.

The survey was sent to all four-year colleges and universities that were members, excluding special purpose institutions such as medical centers and theological institutions (a total of 232 campuses of 140 institutions). Responses were received from 106 campuses (46 percent). The results were published in the document The State of the Arts at State Universities and Land-Grant Colleges.8/ The report states that the total membership represents about 30 percent of all students enrolled in higher education institutions at that time.

8/ Walters, Walter H. (Chairman, Fine Arts Commission). Foreword. The State of the Arts at State Universities and Land-Grant Colleges, National Association of State Universities and Land-Grant Colleges, 1978.

As a result of its survey findings, the commission concluded that "public universities have taken a dominant role as patrons of the arts, providing showcases for professional artists and their works through their concert halls and theatre stages, and their lecture halls, museums and galleries."[9] The section on arts programming reported that there were a total of "4,036 exhibitions of art or craft works and 10,731 performances of musical recital and concerts, theatre, opera, musical theatre and dance productions presented on campus during one calendar year. Of these, 67.8 percent of the exhibitions and 83.9 percent of the performances were by students and faculty. The remainder were exhibitions by non-university artists and performances in artists series programs"[10] (22.2 percent of the exhibitions and 16.1 percent of the performances, respectively).

Broken down by type of artistic activity, the following figures on presentation of professional artists on campus (including events in which these artists participate with students and faculty) were reported:

- 32.3 percent of 4,036 exhibitions of art and craft works on campus
- 13.7 percent of 8,533 concerts
- 16.1 percent of 1,288 theater productions (exclusive of opera and dance)
- 18.9 percent of 380 opera or musical theater productions
- 51.5 percent of 530 dance productions (exclusive of drama and opera)

National Association of Schools of Music

The National Association of Schools of Music (NASM) is described in more detail in the sections on chamber and choral music. In NASM's 1980 chamber music survey, data were included on presentation of professional touring chamber ensembles by member institutions. Two types of nonresident ensembles were discussed:

1. Guest artist ensembles: Ensembles that come to an institution for one or two days to perform a concert and perhaps give a workshop and/or a master class.

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[9] Ibid. Foreward.

[10] Ibid. p. 15.

2. Visiting ensembles: Permanent ensembles not permanently affiliated with the institution that stay on campus for at least a week.

According to NASM in its report on the survey results, 228 guest artist ensembles made over 250 appearances during 1979-80 at 221 music training institutions (out of the 413 surveyed), with approximately $1.6 million spent in support of guest artist chamber ensembles on campus. This figure compares with the 1979 ACUCAA figure of $535,000 spent by 113 institutions.

> Most institutions that have guest artist ensembles on campus spend between $1,000 and $5,000 during a typical academic year; however, twelve institutions reported spending between $25,000 and $50,000, and two institutions spent over $50,000 in a typical academic year for chamber music guest artists.[11]

NASM additionally notes that 92 of the respondent institutions maintain a guest artist chamber music series on campus. In addition, 35 institutions reported that they hosted 41 visiting ensembles in 1979-80. A significant proportion of these schools (43 percent) sponsor them in cooperation with other organizations such as symphonies, churches, or civic organizations.

Community Arts Agencies

Four data sources were found that dealt with community arts agencies. These include the 1976 NRCA study, the ACUCAA data set, the 1976 Statistical Profile of Community Arts Agencies of the American Council for the Arts, and the membership surveys conducted at the end of the decade by the National Assembly of Community Arts Agencies (NACAA). (The ACUCAA data for "other nonprofit groups," which included community arts agencies, were presented in the previous section. Data were available on this group for 1977 and 1979.)

One problem encountered in comparing these sources is in distinguishing this category of organizations definitionally from some others that are described elsewhere. The most thorough definition available from these sources was that provided by ACA in its 1976 profile report:

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[11] National Associaton of Schools of Music, op cit. p. 123.

> For the purposes of this study, community arts agencies are defined as "public, private or other" agencies that are concerned with the vitality of the arts in a geographic area that is connected by a sense of unity and common interest. The definition implies concern for the arts generally. It excludes organizations that are concerned solely with one art form or with the program of a single institution. The geographic area may include metropolitan areas, a number of counties or cities linked together, single counties, cities, townships or parts of cities. It excludes arts agencies and regional groupings that involve more than two entire states. Community arts agencies may be called community arts councils, city arts commissions, or county arts commissions. They include united arts fund organizations. They include those arts centers that are concerned with a wide range of community services.[12]

In its 1976 study, NRCA reported data for a single category that included arts service organizations and community or neighborhood arts councils, defined as "organizations whose purposes are to provide services for the general advancement or support of the arts, such as calendars of information, training programs, management or support services." (Art centers were reported in a separate category and were discussed earlier in a separate subsection.)

The NACAA data as reported did not include a definition of its member organizations other than the stratification categories used. Those definitions are presented later where this data source is described more fully.

National Research Center for the Arts

In its 1976 universe study, NRCA published data for a category of arts service organizations and community or neighborhood arts councils. On the basis of the survey results, the study projected 501 such institutions in its universe (or 9 percent of the total of 5,340 nonprofit institutions). By budget size, they are distributed as follows:

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[12] American Council for the Arts. 1976 Statistical Profile of Community Arts Agencies, June 26, 1976. p. 1.

Under $50,000 - 273 (54 percent)
$50,000 - $99,999 - 108 (22 percent)
$100,000 - $249,000 - 82 (16 percent)
$250,000 - $499,999 - 33 (7 percent)
$500,000 - $999,999 - 3 (1 percent)
$1 - $4.9 million - 1
$5 million and over - 1

According to the report, the estimated 501 organizations had projected total operating expenditures of $49,488,000 (3 percent of the total figure for all 5,340), earned revenues of $17,904,000 (2 percent of the total), and total government support of $21,799,400 (5 percent of the total). Figure F-25 summarizes the distributions of government and private support presented in the data (only percentages were reported).

American Council for the Arts

In 1976, ACA conducted a survey of community arts agencies by sending questionnaires to over 1,000 CAAs identified from ACA/NACAA membership lists and from lists provided by state arts agencies. Over 800 were returned, of which 700 were included in the analysis of survey findings. This constitutes a response rate of 70 percent, which is quite good in relation to many other data collections within the arts community.

The ACA data are reported for the total sample of 700 and also for the 88 major CAAs (those with annual budgets of $100,000). There are further stratifications by governing authority (public, private, and other) and year of founding (pre-1973, post-1973). Of the total of 700, 25 were founded before 1950, 33 during 1950-59, and 197 during 1960-69. The report notes that this corresponds with the formation of the National Endowment for the Arts and many state arts agencies. The remainder (445) were founded during 1970-76, with 115 (16 percent) coming into being in 1975. (See Figures F-26 and F-27.)

The majority of CAAs were private (552, or 78.9 percent); 115 were public (16.4 percent), and 33 (4.7 percent) were in the "other" category (under the auspices of another organization). The report notes that there was a marked increase in public agencies in 1974 and 1975, possibly the result of a resolution by the U.S. Conference

ARTS COUNCILS/SERVICE ORGANIZATIONS (1976)
PATTERNS OF GOVERNMENT AND PRIVATE SUPPORT

Government Support

	$ (000's)*	% of Total
NEA	5,025.2	22
NEH	161.9	1
Other Federal	2,775.9	13
State Arts Councils	7,422.7	33
Other State Government	1,243.1	6
County Government	1,276.0	6
Municipal Government	3,903.6	18
Other Government	179.3	1
TOTAL	$21,987.7**	100

Private Support

	$ (000's)*	% of Total
Individual Contributions	1,018.6	13
Corporate Contributions	1,617.0	20
Private & Community Foundations	2,899.2	36
Combined Community Fund Efforts	1,565.7	19
Allocations from Affiliated Organizations	495.1	6
Other Private Contributions	436.4	5
TOTAL	$8,032.0**	100

*Calculated from percents reported in the data.

**These figures are slightly higher than actual total dollars reported due to the rounding of the reported percentage figures on which they were based.

Source: The Status of Nonprofit Arts and Museum Institutions in the United States in 1976, National Research Center for the Arts

FIGURE F-25

TOTAL SAMPLE: STRUCTURE/YEAR OF FOUNDING

TABLE 1.1A

	GRAND TOTAL	% OF GT	PUB CAA	% OF PUB	PRIV CAA	% OF PRIV	OTHER CAA	% OF OTH
	700	100.0	115	100.0	552	100.0	33	100.0
YEAR OF FOUNDING								
Pre-1949	25	3.6	10	8.7	15	2.7	0	0
1950-1959	33	4.7	4	3.5	28	5.1	1	3.0
1960-1969	197	28.2	27	23.4	165	29.9	5	15.1
1970	33	4.7	5	4.3	26	4.7	2	6.1
1971	47	6.7	8	7.0	32	5.8	7	21.2
1972	61	8.7	8	7.0	50	9.1	3	9.1
1973	71	10.1	7	6.1	58	10.5	6	18.2
1974	94	13.4	19	16.5	73	13.2	2	6.1
1975	115	16.5	23	20.0	86	15.6	6	18.2
1976 (Incomplete)	24	3.4	4	3.5	19	3.4	1	3.0

TABLE 1.1B

	700	100.0	115	100.0	552	100.0	33	100.0
Pre-1949 to 1972	396	56.6	62	53.9	316	57.2	18	54.5
1973 to 1976	304	43.4	53	46.1	236	42.8	15	45.5

ource: 1976 Statistical Profile of Community Arts Agencies, American Council for the Arts

FIGURE F-26

LE 2.1

TOTAL SAMPLE: REGIONAL DISTRIBUTION

	GRAND TOTAL	% OF GT	PUBLIC CAA	% OF PUB	PRIVATE CAA	% OF PRIV	OTHER CAA	% OF OTH	PRE 1973	% OF PRE	POST 1973	% OF POST
	700	100.0	115	100.0	552	100.0	33	100.0	396	100.0	304	100.0
ION												
th East	127	18.1	17	14.8	103	18.7	7	21.2	77	19.4	50	16.4
Atlantic	79	11.3	24	20.9	52	9.4	3	9.1	45	11.4	34	11.2
th East	134	19.1	18	15.7	105	19.0	11	33.3	63	15.9	71	23.4
th Central	137	19.7	15	13.0	114	20.7	8	24.2	78	19.7	59	19.4
er Plains	77	11.0	6	5.2	69	12.5	2	6.1	44	11.1	33	10.9
tern	38	5.4	5	4.3	31	5.6	2	6.1	23	5.8	15	4.9
ific	108	15.4	30	26.1	78	14.1	0	0	66	16.7	42	13.8

ource: 1976 Statistical Profile of Community Arts Agencies, American Council for the Arts

FIGURE F-27

of Mayors (the "Resolution on the Quality of Life in our Cities"), which resolved that "every city be encouraged to establish a public agency specifically concerned with the arts."[13/] Of the 88 major CAAs, 27 were public (30.6 percent), 60 were private (68.1 percent), and only 1 was under the auspices of another organization. In all three categories, the majority were founded prior to 1973: 20, 51, and 1, respectively, or a total of 72 of the 88 (81.8 percent). (See Figures F-28 and F-29.)

The discussion in the report on activities in which CAAs were involved was very generalized and consisted primarily of numbers and percentages of CAAs that indicated that they were involved in those activiies. There were no figures on the numbers of activities or attendance. Respondents reacted to a list of 30 activities, of which 4 represent the presentation function: performances/tours, art exhibits, art festivals, and film festivals. The chart below summarizes these figures for the total sample and the major CAAs. Although further stratifications were included in the report, there were no significant differences between categories, so they are not included here.

COMMUNITY ARTS AGENCIES INDICATING
INVOLVEMENT IN PRESENTATION ACTIVITIES

Activity	Total Sample (700)		Majors (88)	
	#	%	#	%
Performances/Tours	454	64.9	59	67.1
Art Exhibits	444	63.4	54	61.4
Art Festivals	422	60.3	58	65.9
Film Festivals	149	21.3	28	31.8

There is quite a bit of detail provided in the ACA report on budget levels and income sources of community arts agencies. Figure F-30 presents the stratification of the sample by budget size, governing authority and year of founding. Slightly over 50 prcent of the total sample (359 CAAs, or 51.3 percent) had budgets under $10,000. Of the remainder, 28 percent (197) had budgets between $10,000 and $50,000, 8 percent (56) between $50,000 and $100,000, and 12.6 percent (88, the majors) of $100,000 or more. There was a larger proportion of private agencies over $50,000 (107, or 43.4 percent) in relation to public agencies (35, or 30.5 percent), and "other"

[13/] Ibid. p. 4.

MAJOR CAAS: STRUCTURE/YEAR OF FOUNDING

ABLE 1.2A

	GRAND TOTAL	% OF GT	PUB CAA	% OF PUB	PRIV CAA	% OF PRIV	OTH CAA	% OF OTH
	88	100.0	27	100.0	60	100.0	1	100.0
EAR OF FOUNDING								
Pre-1949	9	10.2	4	14.8	5	8.3	0	0
1950-1959	9	10.2	1	3.7	8	13.3	0	0
1960-1969	37	42.0	9	33.4	28	46.8	0	0
1970	3	3.4	1	3.7	2	3.3	0	0
1971	8	9.1	5	18.5	3	5.0	0	0
1972	6	6.8	0	0	5	8.3	1	100.0
1973	8	9.1	3	11.1	5	8.3	0	0
1974	4	4.6	1	3.7	3	5.0	0	0
1975	4	4.6	3	11.1	1	1.7	0	0
1976 (Incomplete)	0	0	0	0	0	0	0	0

ABLE 1.2B

	88	100.0	27	100.0	60	100.0	1	100.0
e-1949 - 1972	72	81.8	20	74.1	51	85.0	1	100.0
1973 - 1976	16	18.2	7	25.9	9	15.0	0	0

ce: 1976 Statistical Profile of Community Arts Agencies, American Council for the Arts

FIGURE F-28

TABLE 2.2

MAJOR CAAS: REGIONAL DISTRIBUTION

	GRAND TOTAL	% OF GT	PUBLIC CAA	% OF PUB	PRIVATE CAA	% OF PRIV	OTHER CAA	% OF OTH	PRE 1973	% OF PRE	POST 1973	% OF POST
	88	100.0	27	100.0	60	100.0	1	100.0	72	100.0	16	100.0
EGION												
orth East	22	25.0	[illegible]	18.5	16	26.7	1	100.0	19	26.4	3	18.8
id Atlantic	13	14.8	4	14.8	9	15.0	0	0	12	16.6	1	6.2
outh East	14	15.9	2	7.4	12	20.0	0	0	11	15.3	3	18.8
orth Central	13	14.8	2	7.4	11	13.3	0	0	9	12.5	4	25.0
ower Plains	9	10.2	2	7.4	7	11.7	0	0	8	11.1	1	6.2
estern	2	2.3	0	0	2	3.3	0	0	2	2.8	0	0
acific	15	17.0	12	44.5	3	5.0	0	0	11	15.3	4	25.0

Source: 1976 Statistical Profile of Community Arts Agencies, American Council for the Arts

FIGURE F-29

ABLE 7

TOTAL SAMPLE: BUDGET LEVEL

	GRAND TOTAL	% OF GT	PUBLIC CAA	% OF PUB	PRIVATE CAA	% OF PRIV	OTHER CAA	% OF OTH	PRE 1973	% OF PRE	POST 1973	% OF POST
	700	100.0	115	100.0	552	100.0	33	100.0	396	100.0	304	100.0
DGET LEVEL												
Budget	38	5.4	8	7.0	26	4.7	4	12.1	8	1.0	30	9.9
- $9,999	321	45.9	42	36.5	260	47.1	19	57.7	137	34.6	184	60.4
0,000 - $49,999	197	28.1	30	26.0	159	28.8	8	24.2	133	33.6	64	21.1
0,000 - $99,999	56	8.0	8	7.0	47	8.5	1	3.0	46	11.6	10	3.3
00,000 and over	88	12.6	27	23.5	60	10.9	1	3.0	72	18.2	16	5.3

urce: 1976 Statistical Profile of Community Arts Agencies, American Council for the Arts

FIGURE F-30

agencies (2, or 6 percent). With regard to year of founding, the pre-1973 group had a greater proportion of CAAs with budgets over $50,000 (118, or 29.8 percent) than the post-1973 group (26, or 8.6 percent).

Figure F-31 shows the survey results on total expenditures and income by source, stratified by governing authority and year of founding, respectively. In summary, 700 organizations had total expenditures of $50,650,019 in 1976 and total income of $51,498,359. The private CAAs had a greater proportion of earned income (27 percent) and contributions from business and individuals (28.5 percent) than the rest; public agencies had a greater proportion of support income from city government (53 percent). The other CAAs had greater proportions of support from NEA (16 percent), State arts agencies (30 percent), and foundations (12.5 percent). The 72 pre-1973 agencies had a slightly higher proportion of earned income (21.2 percent); the latter had more Federal and state support (a total of 30.7 percent) than the former (12.7 percent). With regard to private income sources, the proportional differences are minor.

Figure F-32 shows the same analysis for the 88 major CAAs. As one would expect, the major CAA's account for the majority of the total dollars (with a total income of $41,584,314, and total expenses of $40,476,729, both of which are approximately 80 percent of the total figures for the full sample of 700).

By governing authority, the ratios of income by source are very similar to those for the total sample (except for the major public agencies that receive 23.3 percent of their income from the county in relation to only 4.2 percent for the total sample of public agencies). Also, the one "other" CAA in the majors received a greater proportion of income from NEA (26.2 versus 16 percent) and from the state arts agency (37.2 percent versus 30 percent) than the total sample in the "other" category. In addition, this agency received no support from other Federal, state or local sources or from memberships.

In summary, this is the one source that provides relatively complete and useful information for the purposes of this study about the community arts agency population.

ABLE 8.1

TOTAL SAMPLE: INCOME SOURCES/DOLLAR AMOUNTS

	GRAND TOTAL	% OF INCOME	PUBLIC CAA	% OF INCOME	PRIVATE CAA	% OF INCOME	OTHER CAA	% OF INCOME
NCOME	$51,498,359	(100.0)	$15,680,122	(100.0)	$35,236,560	(100.0)	$581,677	(100.0)
XPENDITURES	50,650,019	(98.4)	15,815,075	(100.9)	34,259,008	(97.2)	575.936	(99.0)
NCOME SOURCES								
arned	10,345,479	(20.1)	777,616	(5.0)	9,518,472	(27.0)	49,391	(8.5)
at'l Endowment	1,823,768	(3.5)	462,089	(2.9)	1,268,754	(3.6)	92,925	(16.0)
ther Federal	2,138,938	(4.2)	1,341,385	(8.6)	779,763	(2.2)	17,790	(3.1)
AA	3,261,987	(6.3)	310,804	(2.0)	2,776,818	(7.9)	174,365	(30.0)
ther State	557,065	(1.1)	50,862	(0.3)	472,194	(1.3)	34,009	(5.8)
ity	10,156,820	(19.7)	8,328,359	(53.0)	1,807,161	(5.1)	21,300	(3.7)
ounty	5,156,258	(10.0)	3,680,635	(4.2)	1,464,573	(4.2)	11,050	(1.9)
oundations	3,535,588	(6.9)	167.038	(1.1)	3,295,795	(9.4)	72,755	(12.5)
usiness	6,139,446	(11.9)	141,575	(0.9)	5,973,256	(17.0)	24,615	(4.2)
ndividual	4,378,019	(8.5)	273,531	(1.7)	4,075,977	(11.5)	28,511	(4.9)
emberships	1,450,290	(2.8)	24,847	(0.2)	1,417,584	(4.0)	7,859	(1.3)
ther	2,554,701	(5.0)	121,281	(0.8)	2,386,213	(6.8)	47,107	(8.1)

ource: 1976 Statistical Profile of Community Arts Agencies, American Council for the Arts

FIGURE F-31

TABLE 8.1 (cont.) TOTAL SAMPLE: INCOME SOURCES/DOLLAR AMOUNTS (CONT.)

	GRAND TOTAL	% OF INCOME	PRE 1973	% OF INCOME	POST 1973	% OF INCOME
INCOME	$51,498,359	(100.0)	$44,467,917	(100.0)	$7,030,442	(100.0)
EXPENDITURES	50,650,019	(98.4)	43,926,931	(98.9)	6,723,088	(95.6)
INCOME SOURCES						
Earned	10,345,479	(20.1)	9,411,440	(21.2)	934,039	(13.2)
Nat'l Endowment	1,823,768	(3.5)	1,365,157	(3.1)	458,611	(6.5)
Other Federal	2,138,938	(4.2)	1,270,640	(2.9)	868,298	(12.4)
SAA	3,261,987	(6.3)	2,547,437	(5.7)	714,550	(10.2)
Other State	557,065	(1.1)	443,519	(1.0)	113,546	(1.6)
City	10,156,820	(19.7)	8,887,382	(20.0)	1,269,438	(18.0)
County	5,156,258	(10.0)	4,646,246	(10.4)	510,012	(7.3)
Foundations	3,535,588	(6.9)	2,936,785	(6.6)	598,803	(8.5)
Business	6,139,446	(11.9)	5,204,648	(11.7)	934,798	(13.3)
Individual	4,378,019	(8.5)	4,068,311	(9.1)	309,708	(4.4)
Memberships	1,450,290	(2.8)	1,305,350	(2.9)	144,940	(2.1)
Other	2,554,701	(5.0)	2,381,002	(5.4)	173,699	(2.5)

Source: 1976 Statistical Profile of Community Arts Agencies, American Council for the Arts

FIGURE F-31 (Continued)

ABLE 8.2

MAJOR CAAS: INCOME SOURCES/DOLLAR AMOUNTS

	GRAND TOTAL	% OF INCOME	PUBLIC CAA	% OF INCOME	PRIVATE CAA	% OF INCOME	OTHER CAA	% OF INCOME
COME	$41,584,314	(100.0)	$14,186,599	(100.0)	$27,206,815	(100.0)	$190,900	(100.0)
PENDITURES	40,476,729	(97.3)	14,469,044	(102.0)	25,819,585	(94.9)	188,100	(99.0)
COME SOURCES								
rned	8,009,014	(19.3)	652,977	(4.6)	7,347,937	(27.0)	8,100	(4.2)
t'l Endowment	1,345,420	(3.2)	349,950	(2.8)	900,470	(3.3)	50,000	(26.2)
her Federal	1,657,417	(4.0)	1,281,878	(9.0)	375,539	(1.4)	0	(0)
A	1,575,309	(3.8)	208,046	(1.5)	1,296,463	(4.8)	70,800	(37.2)
her State	398,399	(1.0)	37,675	(0.3)	360,724	(1.3)	0	(0)
ty	8,859,296	(21.2)	7,629,863	(53.7)	1,229,433	(4.5)	0	(0)
ounty	4,430,436	(10.7)	3,299,490	(23.3)	1,130,946	(4.2)	0	(0)
oundations	2,961,850	(7.1)	167,038	(1.2)	2,773,812	(10.2)	21,000	(11.0)
siness	5,601,570	(13.5)	138,972	(1.0)	5,444,598	(20.0)	18,000	(9.4)
ndividual	3,774,903	(9.1)	257,710	(1.8)	3,494,193	(12.9)	23,000	(12.0)
emberhsips	746,943	(1.8)	0	(0)	746,943	(2.7)	0	(0)
her	2,223,757	(5.3)	118,000	(0.8)	2,105,757	(7.7)	0	(0)

urce: 1976 Statistical Profile of Community Arts Agencies, American Council for the Arts

FIGURE F-32

TABLE 8.2 (cont.)

MAJOR CAAS: INCOME SOURCES/DOLLAR AMOUNTS

	GRAND TOTAL	% OF MAJ INCOME	% OF ALL INCOME	PRE 1973	% OF INCOME	POST 1973	% OF INCOME
INCOME	$41,584,314	(100.0)	(80.7)	$37,504,715	(100.0)	$4,079,599	(100.0)
EXPENDITURES	40,476,729	(97.3)	(79.9)	36,393,322	(97.0)	4,083,407	(100.1)
INCOME SOURCES							
Earned	8,009,014	(19.3)	(77.4)	7,538,034	(20.1)	470,980	(11.6)
Nat'l Endowment	1,345,420	(3.2)	(73.8)	1,127,208	(3.0)	218,212	(5.3)
Other Federal	1,657,417	(4.0)	(77.5)	921,613	(2.5)	735,804	(18.1)
SAA	1,575,309	(3.8)	(48.3)	1,386,155	(3.7)	189,154	(4.6)
Other State	398,399	(1.0)	(71.5)	346,904	(0.9)	51,495	(1.3)
City	8,859,296	(21.2)	(87.2)	8,204,237	(21.9)	655,059	(16.1)
County	4,430,436	(10.7)	(85.9)	4,027,536	(10.7)	402,900	(9.9)
Foundations	2,961,850	(7.1)	(83.8)	2,655,043	(7.1)	306,807	(7.5)
Business	5,601,570	(13.5)	(91.2)	4,781,359	(12.7)	820,211	(20.1)
Individual	3,774,903	(9.1)	(86.2)	3,643,056	(9.7)	131,817	(3.2)
Memberships	746,943	(1.8)	(51.5)	741,226	(2.0)	5,717	(0.1)
Other	2,223,757	(5.3)	(87.0)	2,132,314	(5.7)	91,433	(2.2)

Source: 1976 Statistical Profile of Community Arts Agencies, American Council for the Arts

FIGURE F-32 (Continued)

National Assembly of Community Arts Agencies

The National Assembly of Community Arts Agencies (NACAA) was formed in 1977 as a national service organization for local arts agencies. By 1980, its membership was 450 agencies, according to Gretchen Wiest, associate director. In 1979, NACAA conducted a survey of its members. There is no information in the results on how many organizations were sent a questionnaire. There were 300 responses to the survey. From these responses and from interviews with state and local arts agency leaders, NACAA produced a brief descriptive profile of the demographic and economic characteristics of community arts agencies. Figures F-33 through F-35 are the NACAA data in the form in which they appeared. No analysis accompanied them.

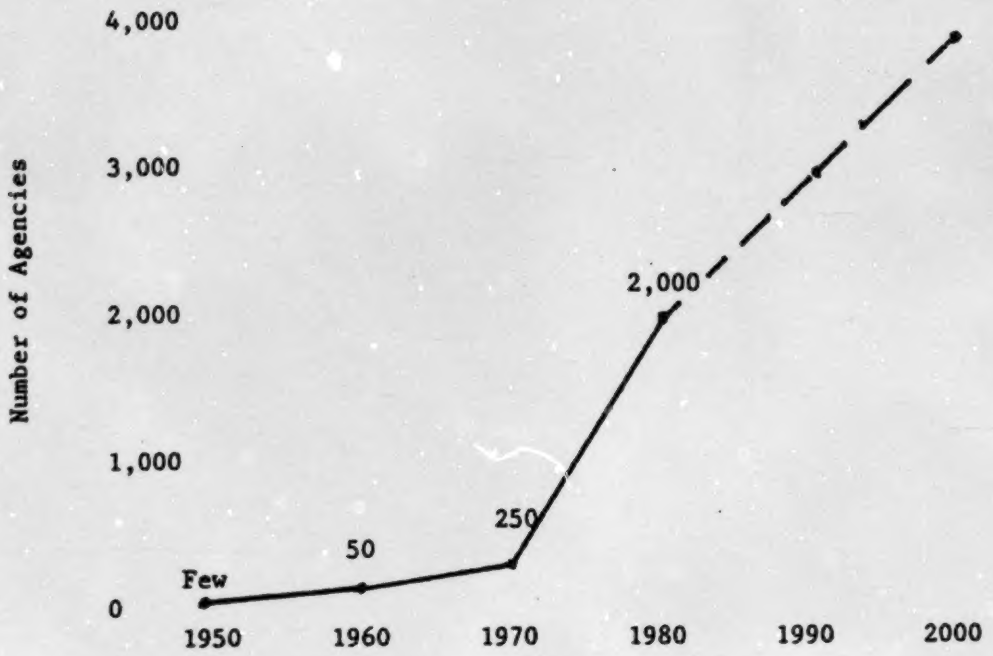
What is interesting, for the purpose of this study, is the growth line in Figure F-33 showing an increase in the number of agencies from 250 in 1970 to around 2,000 by 1980. In Figure F-34, characteristics of survey respondents were projected to the universe of 2,000 agencies, stratified by type of community, type of agency and budget size. The following definitions were provided:

Large Urban - A service area population of more than 500,000.
Urban - A service area population of 30,000 to 500,000
Rural - A service area population of under 30,000.
Public Agency - An arts commission that is part of local government.
Publicly Designated - A private, nonprofit agency that is officially recognized as an official arts agency for local government.
Private - A private, nonprofit agency with no official link with local government.

The data show that of the 2,000 agencies, 440 (22 percent) were public, 280 (14 percent) were publicly designated, and 1,280 (64 percent) were private. Since these classifications differ slightly from those of the 1976 ACA study, it is difficult to

COMMUNITY ARTS AGENCY PROFILE

A History of Growth



Source: National Assembly of Community Arts Agencies

FIGURE F-33

1979

COMMUNITY ARTS AGENCY PROFILE

Demographic Distribution

	Public Agencies	Publicly Designated	Private	Total
Large Urban	100	75	165	340*
Urban	280	155	745	1180
Rural	60	50	370	480
Total	440	280	1280	2000

* Many large urban areas have several community arts agencies.

Budget Size

	Low	High	Median
Large Urban	$22,325	$26.9 million	$331,000
Urban	0	$ 1.8 million	$ 49,500
Rural	0	$ 150,000	$ 6,900

Source: National Assembly of Community Arts Agencies, results of 1979 membership survey.

FIGURE F-34

1979
COMMUNITY ARTS AGENCY PROFILE

Budget Sources

	Local Government	Local Private	Earned	Regional & State	NEA	Other Federal
Large Urban	26%	32%	12%	15%	4%	11%
Urban	18%	29%	19%	18%	3%	13%
Rural	17%	35%	26%	18%	3%	2%
Average	20%	32%	19%	17%	3%	9%

Uses of Funds

	Low	High	Median
Institutions and Traditional Arts Programs	16%	58%	29%
Individual Artists	4%	36%	18%
Non-Traditional Programs	5%	42%	16%
Non-Professional Programs	1%	15%	9%
Facilities, Promotion and Internal Operations	12%	60%	28%

Source: National Assembly of Community Arts Agencies, results of 1979 membership survey

FIGURE F-35

compare them. However, in general, they show a similiar distribution. The ACA figures showed that of 700 agencies, 115 (15 percent) were public, 552 (79 percent) were private and 33 (5 percent) were affiliated with another (nongovernmental) organization. If the NACAA data on the private agencies that were publicly designated were added to the ACA private group, then that group would equal 78 percent of the total (1,560 private agencies).

If the NACAA budget size classifications were applied to numbers of organizations, the results would be as follows:

	Number of Agencies		Median* Dollar Size ($000's)		Projected Total Dollar Size (000's)
Large Urban	340	x	$331.0	=	$112,540.0
Urban	1,180	x	49.5	=	58,410.0
Rural	480	x	6.9	=	3,312.0
TOTAL	2,000				$174,262.0

* It is not clear if the term median (i.e., 50 percent below and 50 percent above the figure) is used correctly here. If it is, it is not the best figure by which to calculate a total dollar size. The mean (arithmetic average) would provide a more accurate figure.

If the ACA total of $50,650,019 were divided by 700, the average budget size would be $72,357. If the NACAA total were divided by 2,000, the average would be $87,131. This is reasonably in line with the ACA figure and the increase could reflect the growth that might naturally occur in three years' time.

When the NACAA income source ratios in Figure F-35 are compared with those of ACA as found in Figure F-31, it again appears that the NACAA data are in line with the ACA data, if the NACAA categories are collapsed as follows:

ACA

Income Category	%
Earned	20.0
NEA	3.5
Other Federal	4.2
SAA	6.3
Other State	1.1
County	10.0
City	20.0
Foundations	6.9
Business	11.9
Individual	8.5
Memberships	2.8
Other	5.0

NACAA

Income Category	%
Earned	19.0
NEA	3.0
Other Federal	9.0
Regional and State	17.0
Local Government	20.0
Local Private	32.0

ACUCAA

The fourth data source on community arts agencies is the biennial surveys of the membership of the Association of College, University and Community Arts Administrations (ACUCAA). The surveys have primarily covered the presentation activities of colleges and universities. Community arts agencies were not represented in the membership prior to 1975, and separate data on them were not reported until the 1977 and 1979 surveys. In both of those years, the response rate was not very high; therefore, data are reported on only a small number of "other nonprofit arts agencies": 33 in 1977 and 9 in 1979. Also, the ACUCAA data do not represent the total fiscal activity of the organization, but rather only those expenses and income sources that relate to their presentation activities. Therefore, since they do not equate to the NACAA and ACA figures, they are not presented here. They have been included with the other ACUCAA data in the previous subsection on colleges and universities where they can be interpreted in context.